

EXHIBIT 4

Expert Report of Martha E.M. Kopacz

**UNITED STATES BANKRUPTCY COURT
EASTERN DISTRICT OF MICHIGAN
SOUTHERN DIVISION**

In re:
City of Detroit, Michigan,
Debtor,

Chapter 9
Case No. 13-53846
Hon. Steven W. Rhodes

**EXPERT REPORT OF MARTHA E.M. KOPACZ
REGARDING THE FEASIBILITY OF THE CITY OF DETROIT PLAN OF
ADJUSTMENT**

On April 22, 2014, Judge Rhodes entered an Order¹ appointing me as the Court's expert witness. Pursuant to that Order, "(t)he Court's expert shall investigate and a reach a conclusion on:

(a) Whether the City's plan is feasible as required by 11 U.S.C. § 943(b)(7);

and

(b) Whether the assumptions that underlie the City's cash flow projections and forecasts regarding its revenues, expenses and plan payments are reasonable."

I am providing this Report under Fed. R. Evid. 706(a). Should additional information become available, I reserve the right to amend or supplement this Report.

¹ Docket #4215, Order Appointing Expert Witness

Section A – Introduction, Scope and Approach

Introduction

I am a Senior Managing Director with Phoenix Management Services, LLC (“Phoenix”), Boston, MA and my *curriculum vitae* is attached as Exhibit 1. I have been assisted throughout this engagement by my colleagues from Phoenix. My billing rate is \$595 per hour and the billing rates of my colleagues range from \$100 per hour to \$550 per hour. As a courtesy, we are reducing our rates by 10% in this case. I have testified previously as noted in my proposal.²

Scope and Approach

The scope of my engagement is limited to providing an opinion *only* as to feasibility of the Plan of Adjustment (“POA” or “Plan”) of the City of Detroit (“Detroit” or the “City”). My engagement does not include providing an opinion regarding the best interest of creditors. There is little applicable case law related to what constitutes feasibility in a chapter 9 proceeding and even less guidance on my

² Docket #4068, Notice Regarding Interviews of Expert Witness Applicants, pages 266-267

role as the Court's independent expert. As such, I developed an approach for this assignment based upon my professional experience and taking into account the facts and circumstances of this matter that I believed to be most relevant. In large measure, I and my team, ("we") have followed the outline contained in my proposal, which is included below.³

- Understand the framework and methodology used to prepare the Ten-Year Plan including reliance on historical information
 - Conduct interviews of key personnel and financial advisors
 - Review documentation used to develop the forecasts
 - Review other third party information to independently verify assumptions
- Perform a detailed analysis of the Plan's financial and cash flow forecasts to determine baseline and critical assumptions
- Critique and analyze critical assumptions - those that have significant dollar and/or timing impact and, if not achieved, could decrease cash flow significantly
 - Revenue and/or cash receipts
 - Cost cutting initiatives
 - Reinvestment initiatives and capital spending
 - Interest rate variations
 - Provisions for contingencies
- Evaluate the execution risks associated with the Ten-Year Plan
 - Availability of financial and human capital
 - Reasonableness of timing assumptions
 - Reasonableness of dollar impact (cost or benefit)
 - Adequacy of contingencies
- Perform sensitivity analysis related to the forecast and critical assumptions, as appropriate, to better assess the achievability of the projections
- Form an opinion as to the feasibility of the Ten-Year Plan, as presented

³Docket #4068, Notice Regarding Interviews of Expert Witness Applicants, pages 256-257

- Prepare a written report supporting the opinion including additional information that facilitates communication and understanding by stakeholders of the likelihood of Plan success and the potential risks associated with Plan execution

We began with stakeholder interviews amongst the groups listed below. The “Contact Log” as directed in Judge Rhodes’ Order, is included as Exhibit 3. This fact- and perception-gathering phase was important to understanding the current situation with the City, the status of bankruptcy case and how the City was approaching its restructuring.

- City of Detroit elected and appointed officials (including the Mayor, City Council President, Chief Financial Officer, Chief of Police and department heads)
- Emergency Manager
- City employees
- City of Detroit retained advisors
 - Jones Day
 - Ernst & Young
 - Conway MacKenzie
 - Miller Buckfire & Co.
- City’s retirement systems (PFRS and GRS) and their advisors
- City’s public safety labor unions and their advisors
- Creditor constituencies and their advisors
- Detroit Land Bank Authority
- Detroit Institute of Art and their advisors
- Charitable foundations and City benefactors

We then approached the analytical phase, which was iterative. We reviewed and analyzed documents relevant to the City’s Plan and the financial projections. We reviewed other City data and third party information to provide background and

perspective on the Ten Year (“10 Yr”) and Forty Year (“40 Yr”) projections and the Restructuring and Reinvestment Initiatives (“RRIs”). We asked more questions of the City, its advisors and other stakeholders, requested more information, and analyzed that information. This process was repeated as necessary until our questions were answered. Some general categories of data, documents and information we reviewed and analyzed are identified below. A more complete listing is included in Exhibit 2.

- Court Documents – POA, Disclosure Statement, City Motions and Creditors’ Objections, Eligibility Opinion, Court Orders, Court Docket
- May 5, 2014 and July 2, 2014 10 Yr projections, 40 Yr projections and RRIs, including working models
- Third Party Reports
 - Detroit Blight Removal Task Force Plan
 - Detroit Future City Strategic Framework Plan
 - Consulting reports – McKinsey
 - State and various task force reports on Detroit’s financial condition
 - Various federal, state and regional government reports

We critiqued the methodology used to develop the financial projections, as well as the data and information used as the foundation for the assumptions. An explanation of these models is contained in Part II, Section E. We identified the assumptions used to create the June 2013 Baseline Projections and the assumptions that formed the 40 Yr projections. We identified and analyzed the assumptions contained in the RRIs and tested both projections (May 5th and July 2nd) for mathematical integrity.

My assessment focused primarily on operations that are accounted for in the City's General Fund. In addition to the City's General Fund activities, the City has numerous operations that are accounted for in Enterprise Funds. Only Enterprise Funds that have an impact on the City's General Fund were evaluated to determine their impact on the feasibility.⁴

The Report

This Report is comprised of four parts. Part I includes my opinion and the building blocks I used to formulate that opinion. This includes background and contextual information that underpin my assessment as well as the definition I and my team formulated for "feasibility" which establishes the framework for my opinion. Part I includes Sections A through D.

Part II is comprised of Sections E through H and provides insight into the quantitative factors that impact my feasibility assessment. Part III consists of

⁴For example the Detroit Department of Transportation (DDOT) operates primarily as an Enterprise Fund but receives a significant subsidy from the General Fund to fund negative cash flow in the Enterprise Fund; therefore, the failure of DDOT to achieve its plans directly impacts the City General Fund.

Sections I through O and include those issues that affect feasibility in a qualitative manner. Part IV contains the Conclusion. A Table of Contents follows.

Table of Contents

PART I		<u>Page</u>
Section A	Introduction, Scope and Approach	2
Section B	Statement of Expert's Opinion	9
Section C	Feasibility Definition	12
Section D	Context	22
PART II		
Section E	City of Detroit Financial Forecast Summary	31
Section F	Revenue and Macro Assumptions	39
Section G	Operating Expenditures	64
Section H	RRIs and Non-Operating Expenditures	85
PART III		
Section I	Systems, Controls and Reporting	111
Section J	Pensions	124
Section K	Human Capital and Leadership	157
Section L	Blight	167
Section M	Post Confirmation Oversight	175
Section N	Unresolved Issues	180
Section O	Other Risks and Opportunities	192
Part IV		
Section P	Conclusion	199

Section B – Statement of Expert’s Opinion

On April 22, 2014, Judge Rhodes entered an Order⁵ appointing me as the Court’s expert witness. Pursuant to that order, “(t)he Court’s expert shall investigate and reach a conclusion on:

(c) Whether the City’s plan is feasible as required by 11 U.S.C. § 943(b)(7);

and

(d) Whether the assumptions that underlie the City’s cash flow projections and forecasts regarding its revenues, expenses and plan payments are reasonable.”

This Report contains my expert opinion and the basis for that opinion. I was assisted by my colleagues at Phoenix Management Services LLC. My work has been guided by the approach that was outlined in my proposal⁶ and discussed during

⁵ Docket # 4215, Order Appointing Expert Witness

⁶ Docket # 4068, Notice Regarding Interviews of Expert Witness Applicants, pages 256 and 257

my interview on April 18, 2014⁷. I, and members of my team, have conducted more than two hundred interviews and fact gathering meetings with persons involved in this matter or with persons I believed to be helpful to me in forming my opinion.

Based on this work, I conclude that:

- (a) The City's plan is feasible as required by 11 U.S. C. § 943(b)(7); and
- (b) The assumptions that underlie the City's plan of adjustment projections regarding its revenues, expenses and plan payments are reasonable.

It should be noted that this opinion is rendered in an environment where there are many factors that will have influence on the City's conditions post confirmation that are unknown and unknowable. Throughout this Report, I have noted some of these factors, while other factors may not even be recognized today as potentially having an impact. My opinion is necessarily limited by these unknown factors. It should be recognized, that these factors, when known, could have a material impact on my view of feasibility.

The above statement should only be viewed in the context of this entire Report. No reliance should be made on these statements outside of the context of this Report.

⁷ Transcript of Hearing, April 18, 2014

The remainder of this Report will provide my definition of feasibility, the context in which I am rendering my opinion and my assessment of the key factors affecting my feasibility assessment. While my opinion is arguably very narrowly limited to “feasibility”, the assessment I and my team did to arrive at my opinion is multifaceted. This Report attempts to clearly and succinctly lay out the foundation, framework and details supporting my opinion.

The following section, Section C, addresses my definition of feasibility and relies upon numerous resources – legal and otherwise – and my own experience to establish the benchmarks against which I assessed feasibility. Section D discusses the context in which I am rendering my opinion. While there are common experiences among every restructuring and even among municipalities, the unique mix that is Detroit and this chapter 9 proceeding, necessarily impact my perspective and opinion. My intent is not to rehash every issue or pleading that has occurred in this case or even Detroit’s recent history, but rather, to highlight a few aspects of the facts and circumstances of this case which have had an important impact on the formulation of my opinion. The last sections of the Report provide a more in depth review of the issues, quantitative and qualitative, I found particularly relevant to my assessment of feasibility. By no means does this Report include every factor I reviewed or considered but does include those issues that shaped my opinion to the greatest extent.

Section C – Feasibility Definition

Defining a Feasibility Standard

Section 943(b)(7) of the Bankruptcy Code requires that before a plan of adjustment may be confirmed the Court must determine that the plan is feasible. However, the Bankruptcy Code does not define “feasible.” Few chapter 9 cases address the feasibility requirement⁸ and there is little in the way of authoritative writing published regarding feasibility.⁹

In assessing feasibility, I have examined available legal authority and consulted with counsel and other experienced professionals to assist in the formation of an appropriate approach to determining feasibility of the City’s POA. Every

⁸ In re *Mount Carbon Metropolitan District*, 242 B.R. 18, 31 (Bankr. D. Colo. 1999) (“The Code does not define feasibility in Chapter 9 nor does it specify what factors the Court should consider in determining whether the Plan is feasible. Due to the relative rarity of Chapter 9 cases, neither the parties nor the Court have found case law specifically addressing the issue.”)

⁹ Pryor, Scott C., Who Bears the Cost? The Necessity of Taxpayer Participation in Chapter 9, (June 11, 2014) Available at SSRN, <http://ssrn.com/abstract=2448997>. The author referring to feasibility: “(w)hat is merely unclear in chapter 11 is an impenetrable fog in chapter 9.”

restructuring professional, with some degree of experience, probably believes they understand what feasibility is and what it is not. However, in my early discussions with professionals in this case, my own research, and consultations with professionals not involved in the Detroit matter, I found a variety of nuanced points of view regarding a definition of feasibility. Therefore, while it will ultimately be up to the Court to articulate the precise legal parameters of feasibility in this Case, I, along with the Phoenix team, have developed the following feasibility definition (the “Standard”), which I believe is crucial to serving the Court’s purpose for my appointment:

‘Is it likely that the City of Detroit, after the confirmation of the Plan of Adjustment, will be able to sustainably provide basic municipal services to the citizens of Detroit and to meet the obligations contemplated in the Plan without the significant probability of a default?’

Two Dimensions of the Standard

While I believe that there are certain imposed limitations on feasibility within this Standard, I have taken a relatively structured approach to my view of what is included in feasibility. The Standard includes both quantitative and qualitative components:

Quantitative

- Are the projections contained in the POA mathematically correct and materially reasonable?
- Are the assumptions that the City has used to develop its projections individually, and when taken as a group, reasonable?
- Is there an adequate contingency included in the projections?

Qualitative

- Does the City have the human resources, or can it likely recruit the human resources, required to meet its obligations under the POA?
- Does the City have the appropriate systems and procedures to monitor its financial performance and to provide early warning signs of variances in performance that might cause the City to fall short of the projections and be unable to meet its obligations under the POA?
- Are there appropriate structures to ensure the City's compliance with the POA and with reasonable government standards of operation?
- Will the City be able to reasonably deliver a minimum level of municipal services?
- Is the City's trajectory sustainable?

The quantitative assessment of feasibility is straightforward but exacting. As will be more fully discussed in Part II, the projections¹⁰ in the POA are (correctly

¹⁰ For purposes of this Report, "projections in the Plan" are inclusive of the 10 Yr plan, the 40 Yr plan and the RRI's. If only one of these is discussed, it will be noted. The term "forecast" is often used as a synonym for "projections". While this is not technically correct within accounting literature, the terms will be used interchangeably in this Report to provide variety. The term "model" is used in this Report to describe the one or more excel spreadsheets that together form a financial projection. A "values only model" or "flat model" is essentially a printout of the excel spreadsheets, although it may be provided in electronic format rather than in hard copy. A "working model" contains all the cell references, formulas and

so) quite detailed in many areas. Financial modeling is a highly subjective undertaking that is affected by the assumptions made and the professional biases of the analyst developing the model. Financial modeling is both a science and an art. When the analyst forecasts growing revenue, declining costs, or a change in headcount, he or she has a number of ways to write the mathematical formulas which arrive at the intended numbers. In this case, the POA projections are comprised of multiple forecasts, inclusive of hundreds of individual spreadsheets, prepared by many different individuals and then concatenated into what we all simply call the “projections”¹¹. Simple questions, such as “are the salaries used to determine the cost of newly hired employees reasonable?” become detailed. For example, the salary estimates are multifaceted depending on which model and which analyst did the modeling and appear in many of the RRI projections. Because of this, the

“macro” commands that are within the spreadsheets and allows a reviewer of the model to understand what the inputs and assumptions are that create the projections. It is in the working model that a reviewer can understand the “art” of the analyst’s modeling.

¹¹ Expert Report of Charles M. Moore, CPA, CTP, CFF in re City of Detroit, Michigan. In footnote 2, Mr. Moore provides a similar explanation of modeling methodology: “Given the number and diversity of the departments my team and I examined, the specific methodology utilized was not exactly the same for each department. Notwithstanding any particular deviations that were necessary, this core methodology and approach was generally utilized across our analysis and development of the Reinvestment Initiatives.” This is an example of differences that can occur within a model built by the same firm. There were also differences in modeling approach used by Conway MacKenzie, Mr. Moore’s firm, and Ernst & Young, the City’s other financial advisor.

quantitative assessment of “reasonableness” surrounding the individual assumptions, and assumptions taken as a group, of the POA projections was more involved than I would have expected.

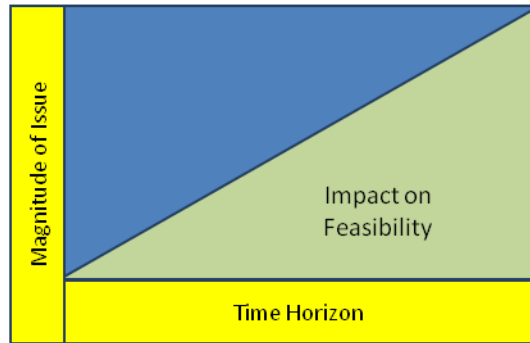
The qualitative aspects of the Standard include what I have come to refer to, as “skill and will” and are as important as the quantitative assessment. Qualitative aspects also include external influences that can affect the implementation of the Plan. Part III, Section K – Leadership and Human Capital, discusses the City’s need for more highly skilled employees. Another qualitative issue is the upcoming transition from the leadership of the Emergency Manager to the leadership of Mayor Duggan and his administration. When that transition occurs, there will be little more than three years remaining within which the current elected officials will have the responsibility to operate the City consistent with the POA – therefore political ‘will’ must be passed to future elected officials. This is not a problem limited to Detroit, but to all municipal proceedings. Section M – Post-Confirmation Oversight discusses ways to mitigate this variable.

The Aspect of Time on the Standard

A municipal government is an entity designed to exist in perpetuity. Therefore, as we considered feasibility there is a requirement to determine the timeframe for the feasibility assessment. As we developed the feasibility Standard, we considered the following questions:

- Given the electoral system and the requirement for strong leadership, do we limit the timeframe to the next election cycle?
- Is there some other timeframe at which feasibility stops? For example, if after 5 years, visibility into the operations of the City becomes more opaque, do we only consider the first 5 years?
- Do we consider the timeframe over which financial commitments are made in the POA? That is, do we look at the restructured pension obligations of the retirees and current employees and attempt to determine whether the POA is feasible during their entire lifetimes?

Ultimately, we based our Standard on an indeterminate time period. However, I believe that the issues of feasibility must be viewed both in terms of their quantitative or qualitative impact and the time horizon over which the impacts may occur. That is, as the time horizon expands, so too does the magnitude required for an issue to impact feasibility. For example, a potential \$50 million shortfall in year 1 will have a much more significant impact on the assessment of feasibility than the same shortfall in year 20.



The Standard Allows for a Range of Values

An additional aspect to my definition of feasibility is the concept that the reasonableness of the quantitative and qualitative components of the Standard can be a range of values. When looking at the reasonableness of assumptions and projections, most people understand that “reasonable” can exist along a continuum. Projections can be reasonable and favor the views of the debtor and projections can be reasonable and favor the views of creditors. Of course, at the outer edges of “reasonable”, values become unreasonable, either because they are exceptionally conservative or wildly aggressive. We have evaluated the assumptions imbedded with the financial forecasts within this continuum of reasonableness.

Detroit differs from a company emerging from chapter 11 in that the City does not have to be service delivery solvent to emerge from bankruptcy. It will be on a

trajectory towards service delivery solvency¹² and in some areas, the current level of service is adequate. I do not need to envision that Detroit will become a best in class municipality to determine that the POA is feasible. For Detroit, emerging from essential services failure to adequate and reasonable service delivery will be a success.¹³

What Feasibility is Not

When we developed the feasibility definition, we also considered what feasibility does not include. First, and foremost, feasibility is not a guarantee. If the City were to propose a plan under which, based on reasonable assumptions, the City could not help but meet its obligations – effectively a guaranteed outcome – it is likely that while feasible, such plan would not satisfy the best interests of creditors test under section 943(b)(7) of the Bankruptcy Code.¹⁴

¹² Eligibility Opinion of Judge Rhodes

¹³ Anderson, Michelle Wild “The New Minimal Cities” <http://yalelawjournal.org/article/the-new-minimal-cities>; March 2014

¹⁴ The “best interest test of creditors” is specifically outside the scope of my appointment and as such, is not part of the opinion I have formed. See Docket #4215, Order Appointing Expert Witness, ¶¶2 and 3.

Similarly, but at the other end of the spectrum, a feasible plan should avoid visionary schemes primarily based on “mere hopes, desires and speculation”¹⁵. Further, the Court must determine whether there is a reasonable prospect of successful completion of the proposed plan.¹⁶ As a point of reference, a frequently cited legal standard for feasibility in Chapter 11 is whether the factual showing at the plan confirmation hearing establishes a “reasonable assurance of success,” though “success need not be guaranteed.”¹⁷

Lastly, I do not believe the Standard entails: (1) whether the projections in the POA may generate more cash to distribute and therefore provide greater recoveries for creditors or (2) whether there may be alternative plans that could produce a better outcome for the City or its creditors. During my team’s evaluation of feasibility, we have been exposed to numerous views on these subjects. Because this is outside my scope and not included in our Standard, I have not attempted to form, nor have I formed, any opinion on these matters.

¹⁵ 242 B.R. 18 (1999) in re Mount Carbon Metropolitan District.

¹⁶ Lawall, Francis J. and Miller, J. Gregg, Debt Adjustments for Municipalities Under Chapter 9 of the Bankruptcy Code, a Collier Monograph, 2012.

¹⁷ Case, Stephen H., Some Confirmed Chapter 11 Plans Fail, So What?, 47 B.C. L. Rev. 59 (2005), <http://lawdigitalcommons.bc.edu/bclr/vol47/iss1/4>.

In summary, the Standard we have defined includes both quantitative and qualitative assessments of feasibility, including a risk assessment measured against a time horizon and allows for a reasonable range of values within the projections. This Standard is the backdrop against which the remainder of this Report should be read.

Section D - Context

This section of the Report attempts to identify some of the contextual parameters for my expert opinion. The role as the Court's expert on feasibility is both vast and specific, and subsumed within a unique set of facts and circumstances surrounding the City of Detroit, its history and plethora of challenges. Included amongst these topics are:

- The impact of the bankruptcy process on the feasibility assessment
- An "as is" perspective of Detroit which anchors my opinion
- An explanation of what the Plan of Adjustment is and is not
- Identification of factors that affect my opinion separate and apart from the proposed POA

Bankruptcy Process Impact

I am humbled and honored to have been selected as the Court's expert in this matter. The speed with which this restructuring and bankruptcy case has progressed is nothing short of extraordinary. The speed has been both an advantage and a disadvantage to the feasibility of the POA.

The restructuring profession generally views quick trips through the bankruptcy process to be advantageous for a variety of reasons: less distraction of the management team, lower professional costs, more negotiated (vs. litigated) solutions, quicker payments to creditors, and less uncertainty for employees and vendors. This could all be true with the Detroit case.

However, I believe the speed of this proceeding has negatively impacted the level of feasibility of the POA. This bankruptcy has been largely focused on deleveraging the City, often to the exclusion of fixing the City's broken operations. The bilateral mediations between the City and the creditor groups worked well to quickly deliver settlements of key disputes. However, the lack of time available for multiparty negotiation has resulted in settlements that, taken in total, greatly reduce the contingency available in the Plan. Pain sharing is an important component of the restructuring process that helps ensure that all the stakeholders appreciate the "size of the pie" as opposed to creating the proverbial "win-lose" tug of war between the debtor and the creditor.

Detroit “As Is”

Detroit is at a tipping point. While some may consider the chapter 9 filing as the low point in this great City’s history, I believe that it was the beginning of creating what can become a virtuous cycle of revitalization, improving economics and quality of life betterments for those who choose to live and work within the City. It is hard to imagine that people with such diverse political and socio-economic perspectives would have come together as they have in this process without the bankruptcy filing. Traditional political maneuverings are working to Detroit’s advantage and residents have the prospect of once again living in a community that is more safe and supportive. Black, white, Republican, Democrat, poor, wealthy, educated, illiterate and everyone in between have an opportunity to contribute to the virtuous cycle of revitalization, or not.

The City of Detroit’s chapter 9 filing has justifiably received extensive attention across international media and within legal and financial circles. The outcomes will be referenced extensively for years, for what was accomplished and arguably, what could have been accomplished during the proceedings. As the largest chapter 9 to date, if any municipality ever needed the protection and tools of the bankruptcy process, it is Detroit. At every level, Detroit was failing as a city – as measured by the shrinking of its population, useful infrastructure and purposeful

enterprises - and as a government – as measured by its inability to deliver essential services. Having spent a large amount of time in Detroit since my appointment, my interaction with citizens, City employees and stakeholders in the bankruptcy have influenced my view of both the in-court restructuring and the out-of-court work that is equally important to Detroit’s ability to effectuate its POA.

The Plan of Adjustment

Even after many years of practice with dysfunctional, insolvent, operationally troubled enterprises, I was confused by the City’s projections in POA. Section E of this Report provides detail on how the projections and RRI’s are structured. Suffice it to say that the “10 Yr projections”, the “10 Yr/40 Yr projections,” and the “Restructuring and Reinvestments Initiatives” form an unusual construct for a financial plan for an enterprise attempting to emerge from bankruptcy. The baseline projections (“10 Yr projection, Exhibit J to the Disclosure Statement) were prepared in June 2013 to show what would happen to the City without a restructuring, which they did very well. The “10 Yr/40 Yr projection” (Exhibit K in the Disclosure Statement) expands the baseline, steady state projection for the 40 Yr time horizon of the POA. Then, in order to begin to understand how the restructured Detroit might operate – delivering services and paying creditors – one must factor in the RRI’s

contained in Exhibit J to the Disclosure Statement. This is convoluted and contributes to the feelings amongst many creditors in this case that the financial projections in the POA are a “black box” and that it was the City’s intent to obfuscate important information. I choose to believe that it was simply an unfortunate result of two advisory firms sharing responsibilities¹⁸ rather than one firm “owning” the financial projections start to finish, as is, and should be, the norm.

The City’s Plan of Adjustment is primarily limited to a “balance sheet” restructuring, as chapter 11 veterans would characterize it, and it includes only some of the City’s operations. This is loosely analogous to a company that files a bankruptcy for the parent company and some, but not all, of the subsidiaries. The chapter 9 proceeding has been overwhelmingly focused on deleveraging the City for the long term, reducing future obligations. That is good. However, the operational restructuring that often occurs with commercial reorganizations will be left largely to Mayor Duggan and his managers for the post confirmation period. That is

¹⁸Ernst & Young, originally retained by the City of Detroit in May 2011, and Conway MacKenzie, originally retained by the City of Detroit in January 2013, have served the City post-petition in a collaborative arrangement. Each firm has taken responsibility for certain aspects of typical debtor “financial advisory” services and the firms work well together. No comments herein should be construed as criticism of this collaboration; rather, I believe it would have been preferable for a single firm to have prepared a single, integrated financial projection for the POA.

unfortunate but is understandable given the speed with which this bankruptcy has occurred and the Emergency Manager's priorities during his similarly short tenure.

Readers of the POA should view the Plan projections as a "sources and uses" statement which describes cash available to fund delivery of some of the services the City provides and certain payments to creditors. As such, these projections are useful only for purposes of confirming the POA (or not, as the case may be) and directionally providing guidance for the City to plan its finances going forward for those operations that are addressed in the POA. It is important to understand that the POA projections are not a business plan for the City. They are not the City's budget. They are not the "financial plan" referenced in Public Acts 181 and 182 of 2014, also referred to as the "Grand Bargain" legislation.

The confusion about the projections in the POA and these other financial plans is evident within the City including its employees, amongst the media and the stakeholders. The projections in the POA have not been harmonized with the City's budget that was passed by the City Council on June 5, 2014. As such, any funding of the RRIs will require first identification of a funding source, and then approval by the CFO and Mayor, and finally, approval by the City Council of a budget amendment to support the appropriations. Although the City has many financial reporting priorities, it is highly advisable that the budget department amend the

approved June budget for the numerous anticipated changes post confirmation, harmonizing the current headcounts and spending levels with the RRI's that the City intends to execute in the coming year, and submit a new budget to the City Council for approval.

The sooner the City can divorce itself from the confusion created by the POA projections, the better. The City needs a multi-year Business Plan which can act as a single financial and operational plan, including all departments and enterprise activities (of which an amended budget would be a part) as well as capital plans that can be publicly communicated and compared to actual performance. A "bridge" should be prepared which identifies the components of the POA projections that are included in the City's Business Plan and then the POA projections can be archived.

Another confusion I believe exists in the POA is the investment plan for infrastructure and service delivery improvements that are required to revitalize the City. Those funds will necessarily come from reducing costs of existing service delivery either through efficiency improvements or elimination of activities. The media has created the impression that the City's investment of more than \$1 billion over the course of the coming years is a "given". This is incorrect. There is no funding source for these investments, including blight removal, other than the Exit

Financing¹⁹ and the projected structural surplus in the POA projections; that is: the projected revenues must exceed the projected expenses of the City for the foreseeable future. It is important that readers of the POA understand there is no cash in a bank account to fund the RRI's. The cash for the investments will come from the Mayor and the departmental leaders delivering services as economically and efficiently as the POA forecasts.

Outside Factors of Influence

I can say, unequivocally, that without the positive and capable leadership of Mayor Duggan and the constructive relationship between the City Council and the Mayor, I would be unable to opine that the plan, as currently proposed, is feasible. The near term future will require course adjustments as undoubtedly revenues and expenses will vary from projections and unforeseen events will demand changes in plans. The democratic system has put in place individuals who, at least for the next three years, can choose to continue the positive course for the City. I believe they will do so.

¹⁹ The City's investment banker, Miller Buckfire & Co. has prepared solicitation materials as is the process of sourcing this financing.

Southeast Michiganders and Detroiters are extensively engaged in civic and charitable pursuits that benefit the revitalization of Detroit. While detractors cite crime rates and nonfunctioning public works, there are a similar group of enthusiastic, impassioned supporters of Detroit's bright future. Two tangible examples are the Detroit Future City plan and the Blight Task Force report. Each of these privately funded efforts resulted in professionally stellar frameworks that current and future elected officials should consider as components of Detroit's master plan. I find it encouraging that there are the underpinnings of business plans for the City which can be blended with financial plans to improve the prospects of success.

In addition, the level of private funds invested in Detroit annually is significant. During my interviews, one executive estimated that private foundations, collectively, spend between \$150-\$200 million annually on "public" works to support investments in the safety, health and welfare and economic development within the City of Detroit. This level of funding is significant to the overall revitalization efforts outlined in the POA.

Section E - City of Detroit Financial Forecast Summary

Introduction

The City's Plan of Adjustment incorporates multiple, interrelated financial forecasts that must be individually and collectively evaluated in order to fully understand how the City intends to operate after a confirmation of the Plan of Adjustment. These forecasts, which vary in both duration and intended scope, emanated from the various City professional advisors and their original responsibilities. To fully appreciate the operating plan for the City, Phoenix has reviewed each of the financial forecasts and has worked with the City and its professionals to understand how each of these documents bridge to one another.

The Plan of Adjustment's financial forecasts are as follows:

1. Plan of Adjustment – Ten Year Financial Projections (the “10 Yr Plan”),
2. Plan of Adjustment – Forty Year Financial Projections (the “40 Yr Plan”)
3. Plan of Adjustment – Restructuring and Reinvestment Initiatives (the “RRIs”)
4. City of Detroit – Triennial Executive Budget (“City Budget”)

Plan of Adjustment – Ten Year Financial Projections

The 10 Yr Plan, built and modified by Ernst & Young (“E&Y”), is the City’s financial forecast for the fiscal years 2014-2023. This plan was originally developed to show how Detroit would operate exclusive of the chapter 9 bankruptcy proceeding. That is, it is effectively the baseline plan. This forecast was built on a department level basis and does not include the quantitative impacts of the restructuring initiatives, the cancellation of debt, the cash flow ramifications from the alterations in the City’s pension plans and OPEB²⁰, and other impacts of the bankruptcy proceedings.

The City and its advisors produced, as part of the Fourth Amended Plan for the Adjustment of Debts of the City of Detroit and the corresponding Fourth Amended Disclosure Statement (dated May 5, 2014), an updated version of the 10 Yr Plan which reflected the then most current forecast assumptions and terms of negotiated agreements. In light of the incremental negotiations, modified forecast assumptions and other changes, a newer 10 Yr Plan (in concert with an updated 40 Yr Plan and modified RRIs) has been produced by the City advisors and is dated July 2, 2014. For the purpose of this Report, Phoenix used the July 2, 2014 version

²⁰ Other Post Employment Benefits

of the City's financial forecasts. The following analysis²¹ identifies the quantifiable variances between the most recent iterations of the City's financial forecasts. While the net of all changes only impacted the Plan by \$5.2 million, on an absolute value basis, the July 2nd version of the 10 Yr Plan contains changes that are in aggregate \$491 million versus the May 5th version for the FY2014-2023 time period.

²¹ The analysis is sourced from the 5.5.14 POA and 7.2.14 POA and figures are from the bibliography: Conway Mackenzie Models:1-54 and Ernst & Young Models 8-11

	7.2.14 POA vs 5.5.14 POA	
	10 Year Variance	Absolute Value Change
<u>Base Model Revenue</u>		
State Revenue Sharing	\$ 36.6	\$ 36.6
Wagering Taxes	\$ (13.1)	\$ 13.1
Property Taxes	\$ (15.7)	\$ 15.7
Sales and Charges for Services	\$ (0.9)	\$ 0.9
Total Base Model Revenue	\$ 6.9	\$ 66.3
<u>Base Model Operating Expenditures</u>		
DDOT Subsidy	\$ (59.7)	59.7
Delay in Payroll Processing	\$ (4.4)	4.4
PLD LED Lights	\$ (2.7)	2.7
Total Base Model Operating Expenditures	\$ (66.8)	\$ 66.8
A. Total Changes to Base Model	\$ (59.9)	\$ 133.1
<u>Reinvestment Revenue</u>		
GSD Grant	\$ 5.7	\$ 5.7
Total Reinvestment Revenue	\$ 5.7	\$ 5.7
<u>Reinvestment Operating Expenditures</u>		
Fire Department Labor Change	\$ (49.8)	\$ 50.7
Police Department - Adjust Avg Salary to Act. in Base Forecast	\$ 22.5	\$ 22.5
Fire Department- Adjust Avg Salary to Act. in Base Forecast	\$ 45.2	\$ 45.2
All Other Labor	\$ 1.5	\$ 2.5
DPD - Increase in Annual Facility Costs of New Precincts	\$ (6.2)	\$ 6.2
Training	\$ (1.1)	\$ 1.1
Purchased Services	\$ (0.7)	\$ 0.7
Total Reinvestment Operating Expenditures	\$ 11.4	\$ 129.0
<u>Capital Investments</u>		
Police Fleet Spending	\$ 10.0	\$ 10.0
GSD Facility Maintenance and Other Capex	\$ 6.1	\$ 6.1
Deferral of Airport Bay Upgrades and T-Hangars	\$ 5.0	\$ 5.0
R&M Fire Dept Facilities	\$ 3.0	\$ 3.0
Rec Facilities	\$ 2.5	\$ 2.5
311 System	\$ 0.6	\$ 0.6
Total Capital Investments	\$ 27.3	\$ 27.3
B. Total Changes to RRI's	\$ 44.4	\$ 162.0
<u>Potential Deals</u>		
Public Safety 3% Bonus in FY 16	\$ (5.6)	\$ 5.6
OPEB now \$1MM for PFRS	\$ 11.7	\$ 11.7
Pension now 12.25% of wages	\$ (21.1)	\$ 21.1
Total Potential Deals	\$ (15.0)	\$ 38.4
<u>Non Operating</u>		
Adjusted Note B	\$ (55.0)	\$ 55.0
Add Note A2	\$ 6.1	\$ 6.1
QOL Exit Financing P&I	\$ 85.1	\$ 85.1
Deferrals	\$ (10.7)	\$ 10.7
Contingency	\$ (0.2)	\$ 0.2
Total Non Operating	\$ 25.3	\$ 157.1
C. Total Changes due to New Deals/Non Operating	\$ 10.3	\$ 195.5
Total Net Change (A+B+C)	\$ (5.2)	\$ 490.6

Plan of Adjustment – Forty Year Financial Projections

The 40 Yr Plan, also built and modified by E&Y, is the financial forecast for the fiscal years 2014-2053 that purports to indicate the City's performance over the next 40 years. Contrary to the 10 Yr Plan, the 40 Yr Plan includes the impact of the RRIs, the cancellation of debt, the cash flow ramifications from the alterations in the City's pension plans and OPEB, and other impacts of the bankruptcy proceedings. The 40 Yr Plan has not been built by department and is only a summary of the overall expected City performance.

Plan of Adjustment - Restructuring and Reinvestment Initiatives

The Restructuring and Reinvestment Initiatives have been constructed and amended by Conway Mackenzie ("CM") following CM's City-wide departmental review begun in January 2013. The reinvestment initiatives include funding for additional City personnel and operating requirements, targeted capital expenditures, and blight removal. In total, the RRIs assume the City will invest approximately \$1.7 billion in restructuring initiatives. This \$1.7 billion of investment is funded in part by \$483 million of incremental revenue generated as a result of the RRIs and \$358 million of anticipated costs savings from the execution of the RRIs over the FY2014-2023 period. The remaining funding source for the RRIs will be generated by operating City surpluses and the Exit Financing. The process to develop these

detailed initiatives included highly detailed inputs, risks, constraints and other factors in how the initiatives will be implemented.

City of Detroit - Triennial Executive Budget

The City annually develops a Triennial Executive Budget that forecasts the financial operations of the City for the subsequent three fiscal years. This budget historically forms the basis for how the City intends to operate on a departmental level and is developed in line with historical government reporting protocols. The Triennial Budget is developed in a manner that allows for reconciliation with the City's fund accounting²² and only includes items for which funding has been received, approved and allocated. The City's FY2015 budget was unanimously approved by the Detroit City Council on June 5, 2014.

The timing of the City's annual budget cycle, including review and approval by the City Council, and the timing of the bankruptcy proceedings created a bit of a

²² Governmental fund accounting is beyond the scope of this Report. However, the reader should appreciate that 1) government accounting standards can vary significantly from those used in the private sector, 2) fund accounting can sometimes create artificial classifications of revenues and expenses that do not resemble how the entity operates on a regular basis and 3) the City's POA projections were prepared separately from the City's Triennial Budget. In the past few weeks, the City's budget team and the financial advisors have worked to reconcile the major differences between the POA projections and the City's budget.

conundrum for the FY2015 budget. As such, the FY2015 budget does not reflect many of the POA proposals, including most of the RRIIs and the revised debt service requirements. This may create a procedural bottleneck in that funding for the RRIIs will require first, approval by the Emergency Manager, Mayor and Chief Financial Officer,²³ and then a budget amendment to be approved by the City Council.

Phoenix Review

Phoenix has thoroughly reviewed each of the above identified forecasts. In addition, numerous meetings have been held to discuss the forecasts with the City, E&Y, and CM. While Phoenix appreciates the inherent complexity of any financial forecast for an enterprise of this magnitude, a number of concerns regarding how the multiple forecasts impact one another warrants discussion.

First and most importantly, the City does not have a consolidated, departmental financial forecast that incorporates the baseline forecast and all of the POA proposals, specifically, the RRIIs. While the respective 10 Yr, 40 Yr, and RRI forecasts have been expertly researched, constructed, and amended, the fact remains

²³ This group is referred to as the “Approving Parties”. Procedures have been established to manage the RRI activities. The Approving Parties will assess the RRI funding requests from the various department heads for appropriateness, ensure that the City has the cash for fund the initiatives and allocate the money amongst the requested initiatives.

that the City does not have an aggregated forecast to use as a fiscal roadmap going forward. During our many meetings with City leadership and department heads, it was evident that the individuals responsible for delivering essential services did not have an adequate understanding of the POA impacts to their operations and the manner in which the RRI's would occur.

I have participated in the budget review meetings with the Mayor, the department heads and their respective teams and believe that the sooner the POA projections, in their current form, can be archived, the better. Although improving, there is still a gap in the understanding by the department heads, relating to their budgets and the impact the RRI's will play in what they will be responsible for in the future. In the next few years, the funding for the RRI's is largely, if not exclusively, dependent on the Exit Financing. At this point, we understand the Exit Financing is not committed and the amount and terms have not been determined. For purposes of my assessment and resulting opinion, I have assumed that Exit Financing will be available in an amount sufficient to implement the POA as set forth in detail later in this Report.

Section F - Revenue and Macro Assumptions

Summary²⁴

The City of Detroit's Plan of Adjustment include 10 Yr revenue projections for the fiscal years 2014-2023 and 40 Yr revenue projections for the fiscal years 2014-2053 ("40 Yr Plan"). The 10 Yr Plan revenues were forecasted including and excluding the assumed accretive impact of the proposed RRI's detailed in the Plan of Adjustment. As illustrated below, the total revenues projected in the 10 Yr Plan - exclusive of the impact of the RRI's - is \$10.4 billion; alternatively, the 10 Yr Plan's cumulative revenues inclusive of the impact of the RRI's is \$11.2 billion.

	FY2014-2023				FY2024-2033				FY2034-2043				FY2044-2053			
	Without Reinvestment		With Reinvestment		With Reinvestment		With Reinvestment		With Reinvestment		With Reinvestment		With Reinvestment		With Reinvestment	
General Fund Revenues																
Municipal income tax	\$	2,566	25%	\$	2,770	25%	\$	3,510	29%	\$	4,591	32%	\$	6,059	35%	
State revenue sharing	\$	2,000	19%	\$	2,000	18%	\$	2,121	18%	\$	2,307	16%	\$	2,533	15%	
Wagering taxes	\$	1,733	17%	\$	1,733	15%	\$	1,906	16%	\$	2,105	15%	\$	2,325	13%	
Sales and charges for services	\$	1,118	11%	\$	1,118	10%	\$	1,161	10%	\$	1,415	10%	\$	1,725	10%	
Property taxes	\$	964	9%	\$	1,074	10%	\$	1,370	11%	\$	1,640	11%	\$	1,903	11%	
Other revenue	\$	713	7%	\$	713	6%	\$	754	6%	\$	918	6%	\$	1,120	6%	
General Fund reimbursements	\$	260	2%	\$	260	2%	\$	239	2%	\$	291	2%	\$	355	2%	
Utility users'	\$	252	2%	\$	257	2%	\$	304	3%	\$	353	2%	\$	410	2%	
Department Revenue Initiatives	\$	-	0%	\$	483	4%	\$	586	5%	\$	715	5%	\$	871	5%	
Transfers in	\$	829	8%	\$	829	7%	\$	148	1%	\$	22	0%	\$	-	0%	
Total General Fund Revenues	\$	10,434	100%	\$	11,237	100%	\$	12,098	100%	\$	14,358	100%	\$	17,302	100%	

²⁴ Unless otherwise stated the financial projections referenced in section F are sourced from the bibliography: Ernst & Young Models: 10-11

The analyses below will identify the City's individual revenue components (on an annual and cumulative basis), the estimated growth for each revenue category over the time periods of both forecasts, and the key assumptions utilized for each revenue category. The following analyses will also identify and compare, where applicable, third party assumptions for various operating metrics (e.g. wages, employment, population, etc.) as they relate to the assumptions the City used to derive these forecasts. Finally, this revenue analysis provides sensitivity scenarios designed to illustrate the variability of the revenue forecasts as underlying assumptions are changed.

Municipal Income Tax

The City of Detroit, in accordance with the Michigan Public Act 284 of 1964, has been one of 22 Michigan municipalities to impose a municipal income tax on its residents, nonresidents working in Detroit, and resident businesses. The City's municipal income tax receipts, due to declines in population and the economy, have decreased by 30% since 2002. Municipal income tax revenues are forecasted to account for 25% of General Fund revenue in the FY2014-2023 period.

As mentioned above, the City's POA projections estimate revenues for the 10 year period covering FY2014-2023 with and without the incremental revenue impact

of the RRI's. The following analysis illustrates the “without Restructuring and Reinvestment Initiatives” scenario.

10 Yr Plan - Without RRI's

The City's 10 Yr Plan forecasts annual municipal income tax through the estimation of the year-over-year (“YoY”) growth in taxable income for the following subsections:

- City residents
 - Average annual YoY taxable income growth: 0.85%
 - Income tax rate: 2.4%
 - FY2014-2023 City resident income taxes: \$1,561 million
- Non-residents
 - Average annual YoY taxable income growth: 1.18%
 - Income tax rate: 1.2%
 - FY2014-2023 non-resident income taxes: \$761 million
- Corporations
 - Average annual YoY taxable income growth: 1.63%
 - Income tax rate: 2.0%
 - FY2014-2023 corporation income taxes: \$245 million

The taxable income growth assumptions appear to be reasonably conservative relative to the recent uptick in taxable income in FY2011-2013. For Detroit residents, taxable income growth has averaged 3.4% annually for those three years. During the same period, taxable income growth has averaged 3.5% for non-residents and 2.2% for corporations. The annual taxable income growth during FY2011-2013

is likely reflective of the recovery from the 2008-2009 financial crisis, when the City's taxable income base suffered double-digit YoY percentage declines.

10 Year Plan – Municipal Income Tax (Without RRI's)

	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	FY2014-2023 Average/Total
Preliminary forecast											
City Residents (A)											
Taxable income growth	1.94%	1.45%	0.46%	0.46%	0.46%	0.46%	0.65%	0.65%	1.00%	1.00%	0.85%
Taxable income	\$ 6,294.0	\$ 6,385.5	\$ 6,414.7	\$ 6,444.0	\$ 6,473.5	\$ 6,503.3	\$ 6,545.8	\$ 6,588.6	\$ 6,654.5	\$ 6,721.1	\$ 65,025.1
Income tax rate	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	
Total City Resident income taxes	151.1	153.3	154.0	154.7	155.4	156.1	157.1	158.1	159.7	161.3	1,560.6
Non-Residents (B)											
Taxable income growth	2.23%	1.70%	0.70%	0.70%	0.70%	0.69%	0.50%	1.19%	1.69%	1.69%	1.18%
Taxable income	\$ 6,065.0	\$ 6,168.1	\$ 6,211.2	\$ 6,254.5	\$ 6,298.0	\$ 6,341.7	\$ 6,373.4	\$ 6,449.4	\$ 6,558.5	\$ 6,669.3	\$ 63,389.0
Income tax rate	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	
Total Non-Resident income taxes	72.8	74.0	74.5	75.1	75.6	76.1	76.5	77.4	78.7	80.0	\$ 760.7
Corporations (C)											
Net tax collection growth	2.34%	2.50%	2.00%	2.00%	2.00%	1.50%	1.00%	1.00%	1.00%	1.00%	1.63%
Taxable income (implied)	\$ 1,128.3	\$ 1,156.5	\$ 1,179.6	\$ 1,203.2	\$ 1,227.3	\$ 1,245.7	\$ 1,258.2	\$ 1,270.7	\$ 1,283.5	\$ 1,296.3	\$ 12,249.3
Corporate tax rate	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	
Net tax collections	22.6	23.1	23.6	24.1	24.5	24.9	25.2	25.4	25.7	25.9	\$ 245.0
Total Municipal income taxes (D) = (A+B+C)											
Taxable income	\$13,487.3	\$13,710.2	\$13,805.5	\$13,901.7	\$13,998.8	\$14,090.7	\$14,177.4	\$14,308.8	\$14,496.5	\$14,686.7	\$ 140,663.5
Calculated tax rate	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	1.8%
Total Municipal income taxes	246.4	250.4	252.1	253.8	255.5	257.1	258.7	260.9	264.1	267.3	\$ 2,566.3
Adjustment Municipal income taxes											
Adjustment for actuals	-	-	-	-	-	-	-	-	-	-	\$ -
Total Adjusted Municipal income taxes	\$ 246.4	\$ 250.4	\$ 252.1	\$ 253.8	\$ 255.5	\$ 257.1	\$ 258.7	\$ 260.9	\$ 264.1	\$ 267.3	\$ 2,566.3

The POA's 10 Yr projections "build up" the annual taxable income growth assumption by adding separate assumptions for annual wage growth and employment growth.

Wage Growth (Without RRI's)

The 10 Yr Plan estimates – for both the City residents and nonresident categories – an average wage growth of 1.25% for the FY2014-FY2023 period, an

estimate that appears reasonable when compared to the state and national forecasts highlighted below. The income growth forecast for corporations is 1.63% and is conservative relative to the State forecast. The Michigan Senate Fiscal Agency assumed an average 2.65% wage growth rate for Detroit which is reflective of the average state forecast of 3.65% reduced by a 1% structural adjustment for the City of Detroit.

Employment Growth (without RRI's)

The annual employment rate of City residents is forecasted to decline by 0.4% for the FY2014-FY2023 period. Non-residents' average annual employment is estimated to decrease by 0.07% for this time period. As was the case with forecasted wage growth, the employment growth assumptions seem reasonable when compared to the recent actual employment growth for the entire City of Detroit over the last three fiscal years which averaged 0.4%.

10 Year Plan – Municipal Income Tax (Without RRI's)

Taxable Income Growth Metrics

	2014	2015	2016	2017	Preliminary forecast						FY2014-2023 Average/Total
					2018	2019	2020	2021	2022	2023	
City Residents (A)											
Wage Growth	2.53%	2.00%	1.00%	1.00%	1.00%	1.00%	1.00%	1.00%	1.00%	1.00%	1.25%
Employment Growth	-0.59%	-0.55%	-0.54%	-0.54%	-0.54%	-0.54%	-0.35%	-0.35%	0.00%	0.00%	-0.40%
Taxable income growth	1.94%	1.45%	0.46%	0.46%	0.46%	0.46%	0.65%	0.65%	1.00%	1.00%	0.85%
Non-Residents (B)											
Wage Growth	2.53%	2.00%	1.00%	1.00%	1.00%	1.00%	1.00%	1.00%	1.00%	1.00%	1.25%
Employment Growth	-0.30%	-0.30%	-0.30%	-0.30%	-0.30%	-0.31%	-0.50%	0.19%	0.69%	0.69%	-0.07%
Taxable income growth	2.23%	1.70%	0.70%	0.70%	0.70%	0.69%	0.50%	1.19%	1.69%	1.69%	1.18%
Corporations (C)											
State CIT forecast (SFA est. May 2013)	3.80%	5.70%	5.00%	4.00%	3.00%	3.00%	3.00%	3.00%	3.00%	3.00%	3.65%
Detroit structural adjust.	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%
Net growth rate	2.80%	4.70%	4.00%	3.00%	2.00%	2.00%	2.00%	2.00%	2.00%	2.00%	2.65%
Assumed Forecast Growth Rate	2.34%	2.50%	2.00%	2.00%	2.00%	1.50%	1.00%	1.00%	1.00%	1.00%	1.63%

10 Yr Plan with RRI's

The 10 Yr projections forecast annual municipal tax income through the estimation of the year-over-year (“YoY”) growth in taxable income for the following subsections:

- City residents
 - Average annual YoY taxable income growth: 2.32%
 - Income tax rate: 2.4%
 - FY2014-FY2023 City resident income taxes: \$1,693 million
- Non-residents
 - Average annual YoY taxable income growth: 2.37%
 - Income tax rate: 1.2%
 - FY2014-FY2023 non-resident income taxes: \$817 million
- Corporations
 - Average annual YoY taxable income growth: 2.65%
 - Income tax rate: 2.0%
 - FY2014-FY2023 corporations income taxes: \$260 million

Due primarily to the more optimistic City residents’ taxable income growth assumptions in the “With Reinvestment Initiatives” scenario, the latter scenario

assumes an additional \$204 million in municipal income tax revenue in the 2014-2023 time period. A Sensitivity Analysis is provided below to gauge the impact of the City's actual results materially deviating from the 10 Yr Plan's forecast.

10 Year Plan – Municipal Income Tax (With RRI's)

	2014	2015	2016	2017	Preliminary forecast						2023	FY2014-2023 Average/Total
					2018	2019	2020	2021	2022			
City Residents (A)												
Taxable income growth	2.57%	3.17%	2.25%	2.19%	2.15%	2.16%	2.18%	2.18%	2.18%	2.18%		2.32%
Taxable income	\$ 6,332.7	\$ 6,533.4	\$ 6,680.7	\$ 6,827.2	\$ 6,974.0	\$ 7,124.5	\$ 7,279.5	\$ 7,437.9	\$ 7,599.7	\$ 7,765.0		\$ 70,554.5
Income tax rate	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>	<u>2.4%</u>		
Total City Resident income taxes	152.0	156.8	160.3	163.9	167.4	171.0	174.7	178.5	182.4	186.4		1,693.3
Non-Residents (B)												
Taxable income growth	2.91%	3.29%	2.18%	2.18%	2.18%	2.18%	2.18%	2.18%	2.18%	2.18%		2.37%
Taxable income	\$ 6,105.4	\$ 6,306.5	\$ 6,444.0	\$ 6,584.5	\$ 6,728.0	\$ 6,874.7	\$ 7,024.6	\$ 7,177.7	\$ 7,334.2	\$ 7,494.1		\$ 68,073.8
Income tax rate	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>	<u>1.2%</u>		
Total Non-Resident income taxes	73.3	75.7	77.3	79.0	80.7	82.5	84.3	86.1	88.0	89.9		\$ 816.9
Corporations (C)												
Net tax collection growth	2.80%	4.70%	4.00%	3.00%	2.00%	2.00%	2.00%	2.00%	2.00%	2.00%		2.65%
Taxable income (implied)	\$ 1,133.4	\$ 1,186.6	\$ 1,234.1	\$ 1,271.1	\$ 1,296.5	\$ 1,322.5	\$ 1,348.9	\$ 1,375.9	\$ 1,403.4	\$ 1,431.5		\$ 13,004.0
Corporate tax rate	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>	<u>2.0%</u>		
Net tax collections	22.7	23.7	24.7	25.4	25.9	26.4	27.0	27.5	28.1	28.6		\$ 260.1
Total Municipal income taxes (D) = (A+B+C)												
Taxable income	\$13,571.4	\$14,026.5	\$14,358.7	\$14,682.8	\$14,998.6	\$15,321.7	\$15,653.0	\$15,991.5	\$16,337.3	\$16,690.6		\$ 151,632.2
Calculated tax rate	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>	<u>1.8%</u>		1.8%
Total Municipal income taxes	247.9	256.2	262.3	268.3	274.0	279.9	286.0	292.2	298.5	304.9		\$ 2,770.3
Adjustment Municipal income taxes												
Adjustment for actuals	-	-	-	-	-	-	-	-	-	-		\$ -
Total Adjusted Municipal income taxes	247.9	256.2	262.3	268.3	274.0	279.9	286.0	292.2	298.5	304.9		2,770.3

Wage Growth (with RRI's)

The 10 Yr projections estimate – for both the City residents and nonresident categories – an average wage growth of 2.16% for the FY2014-2023 period, or

roughly 91 basis points²⁵ higher than the “without RRI” scenario. The wage growth forecast for corporations is 2.65%, or equivalent to the Michigan Senate Fiscal Agency assumption.

Employment Growth (with RRIs)

The number of City residents employed is forecasted to increase 0.15% for the FY2014-2023 period, while the non-residents’ average annual employment is anticipated to increase 0.21% over this time period.

10 Year Plan – Municipal Income Tax (With RRIs)

Taxable Income Growth Metrics

	2014	2015	2016	2017	Preliminary forecast						FY2014-2023 Average/Total
					2018	2019	2020	2021	2022	2023	
City Residents (A)											
Wage Growth	2.53%	3.03%	2.00%	2.00%	2.00%	2.00%	2.00%	2.00%	2.00%	2.00%	2.16%
Employment Growth	-0.13%	0.14%	0.25%	0.19%	0.15%	0.16%	0.18%	0.18%	0.18%	0.18%	0.15%
Taxable income growth	2.57%	3.17%	2.25%	2.19%	2.15%	2.16%	2.18%	2.18%	2.18%	2.18%	2.32%
Non-Residents (B)											
Wage Growth	2.53%	3.03%	2.00%	2.00%	2.00%	2.00%	2.00%	2.00%	2.00%	2.00%	2.16%
Employment Growth	0.38%	0.26%	0.18%	0.18%	0.18%	0.18%	0.18%	0.18%	0.18%	0.18%	0.21%
Taxable income growth	2.91%	3.29%	2.18%	2.18%	2.18%	2.18%	2.18%	2.18%	2.18%	2.18%	2.37%
Corporations (C)											
State CIT forecast (SFA est. May 2013)	3.80%	5.70%	5.00%	4.00%	3.00%	3.00%	3.00%	3.00%	3.00%	3.00%	3.65%
Detroit structural adjust.	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%	-1.00%
Taxable income growth	2.80%	4.70%	4.00%	3.00%	2.00%	2.00%	2.00%	2.00%	2.00%	2.00%	2.65%

²⁵ A basis point is equivalent to 0.01%; therefore 100 basis equals 1%

Comparable Assumptions

When comparing the City of Detroit's wage growth assumptions versus its state or national estimates, the POA's wage assumptions appear reasonable in light of the City's history of lagging state/national statistics.

<u>Comparable Metric Analysis</u>	
<u>Wage Growth</u>	
10 Year Plan - without Reinvestment	1.25%
10 Year Plan - with Reinvestment	2.16%
<u>State</u>	
Michigan Dept. of Treasury - FY2014	3.90%
Michigan Dept. of Treasury - FY2015	3.90%
Michigan Dept. of Treasury - FY2016	3.90%
Michigan Senate Fiscal Agency - FY2014	2.30%
Michigan Senate Fiscal Agency - FY2015	2.60%
<u>Federal</u>	
CBO - Real Wage Growth	2.47%

In a similar fashion to forecasted wage growth, the City's employment growth assumptions for FY2014-2023 are more conservative relative to the applicable State of Michigan forecasts and the City's recent actual results.

<u>Comparable Metric Analysis</u>	
<u>Employment Growth</u>	
10 Year Plan - City Residents - without Reinvestmer	-0.40%
10 Year Plan - Non-Residents - without Reinvestme	-0.07%
10 Year Plan - City Residents - with Reinvestment	0.15%
10 Year Plan - Non-Residents - with Reinvestment	0.21%
<u>State</u>	
Michigan Dept. of Treasury - FY2014	1.50%
Michigan Dept. of Treasury - FY2015	1.40%
Michigan Dept. of Treasury - FY2016	1.40%
Michigan Senate Fiscal Agency - FY2014	0.80%
Michigan Senate Fiscal Agency - FY2015	0.50%

Sensitivity Analysis

The following analysis illustrates the incremental impact to the City of Detroit's actual taxable income if there are deviations to the forecasted metrics in the 10 Yr Plan. For Municipal Income taxes, while multiple economic assumptions factor into the final estimates, the driving metric is the annual growth rate of taxable income. As such, the analysis below estimates the impact of a 1 percentage point change in the forecasted growth rate, up or down, for each category of income tax payer in both scenarios.

(\$ million)	Preliminary forecast										FY2014-2023
	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Total
<u>For Every 1% Change in Annual Taxable Income Growth Rate</u>											
<u>Without Reinvestment</u>											
City Residents	1.5	1.5	1.5	1.5	1.5	1.6	1.6	1.6	1.6	1.6	15.5
Non-Residents	0.7	0.7	0.7	0.7	0.8	0.8	0.8	0.8	0.8	0.8	7.5
Corporations	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.3	0.3	0.3	2.4
Total	2.4	2.5	2.5	2.5	2.5	2.6	2.6	2.6	2.6	2.6	25.4
<u>With Reinvestment</u>											
City Residents	1.5	1.5	1.6	1.6	1.6	1.7	1.7	1.7	1.8	1.8	16.6
Non-Residents	0.7	0.7	0.8	0.8	0.8	0.8	0.8	0.8	0.9	0.9	8.0
Corporations	0.2	0.2	0.2	0.2	0.3	0.3	0.3	0.3	0.3	0.3	2.5
Total	2.4	2.5	2.6	2.6	2.7	2.7	2.8	2.9	2.9	3.0	27.1

For the Without RRIs scenario, every 1 percentage point deviation in the 10 Yr Plan's assumption will result in an approximate \$25 million in collected income tax revenues variance for the FY2014-2023 period. Due to higher income tax forecast in the With Reinvestment Initiatives case, the estimated variance – as compared to the original 10 Yr Plan - increases to \$27 million over that ten year period in question.

State Revenue Sharing

The City of Detroit receives aid from the State of Michigan in connection with constitutional and statutory sharing of sales tax revenue and economic vitality incentive payments (“EVIP”). Per Michigan’s constitution, the State is required to distribute 15% of all state taxes imposed on retailers. The constitutional revenue sharing is a function of a municipality’s population relative to the other

municipalities in Michigan, while the statutory revenue sharing is distributed to municipalities that comply with certain “best practices” and reporting requirements.

	2014	2015	2016	2017	Preliminary forecast					2021	2022	2023	10 Year Total
					2018	2019	2020						
<u>State Revenue Sharing Calculations</u>													
Constitutional Payment	53.5	54.8	56.9	58.5	60.2	62.0	63.8	57.3	59.0	60.7			\$ 586.8
Statutory Payment	136.3	140.5	140.5	140.5	140.5	140.5	140.5	140.5	140.5	140.5			\$ 1,400.5
Estimated State Revenue Sharing	\$ 189.8	\$ 195.3	\$ 197.4	\$ 199.0	\$ 200.7	\$ 202.5	\$ 204.3	\$ 197.8	\$ 199.5	\$ 201.2			\$ 1,987.3
Other shared taxes (including liquor and beer license)	\$ 1.3	\$ 1.3	\$ 1.3	\$ 1.3	\$ 1.3	\$ 1.3	\$ 1.3	\$ 1.3	\$ 1.3	\$ 1.3			\$ 13.2
Total State Revenue Sharing	\$ 191.2	\$ 196.6	\$ 198.7	\$ 200.3	\$ 202.0	\$ 203.8	\$ 205.6	\$ 199.1	\$ 200.8	\$ 202.5			\$ 2,000.5

Constitutional Payments

The State of Michigan’s constitutional payments emanate from the statutory sharing of sales tax revenue and are based upon the population of Detroit (as measured by the decennial Census) as a percentage of the total State’s population. The constitutional payments are distributed every other month via a formula multiplying Detroit’s population by defined distribution rates.

The 10 Yr projections utilize Detroit’s population from the 2010 Census – 712,501 – to factor the State’s constitutional payment for the fiscal years 2014-2021. For FY2022 and FY2023, the 10 Yr Plan utilized the Southeast Michigan Council of Governments (“SEMCOG”) forecast which reflects a 12.3% decline in Detroit’s population to 625,152.

Statutory Payments

The State's EVIP funds are appropriated annually by the State Legislature and therefore carry more inherent risk than the mandated State constitutional payments.

The EVIP funds are allocated per the following categories:

- Category 1 – Accountability and Transparency
 - Each municipality is required by October 1st to produce a citizen's guide of its most recent local finances, including a recognition of unfunded liabilities, a performance dashboard, a debt service report, and a project budget report
- Category 2 – Consolidation of Services
 - Each municipality is required by February 1st to produce a service consolidation plan that is submitted to the Michigan Department of the Treasury; including details of service cooperation, consolidations, and privatizations with estimated cost savings
- Category 3 – Unfunded Accrual Liability Plan
 - Each municipality with unfunded accrual liabilities is required by June 1st to produce a plan to lower all such unfunded accrual liabilities; detailing previous actions taken and a go forward plan of existing and new initiatives

The 10 Yr projections assume that the City continues to receive 100% of its possible State allocation, or approximately \$140 million annually for the entire FY2014-2023 time period.

Sensitivity Analysis

The following analysis illustrates the incremental impact to the City if State Revenue Sharing deviates from the assumptions in the 10 Yr forecast. The analysis

below estimates the impact of a 5% change in the 2020 Census forecasted population and a 5% change in the statutory payment allocation. Because the constitutional payment is based on the 2010 Census figure through FY2021, the impact of a 5% population change would only be realized in FY2022 and FY2023. For the statutory payment, a 5% change in the allocation would have a cumulative impact of \$70 million to the General Fund during the FY2014-2023 period.

	Preliminary forecast											10 Year Total
	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023		
<u>For Every 5% Change in Applicable State Revenue Sharing Metric</u>												
Constitutional Payment	-	-	-	-	-	-	-	-	3.0	3.0	\$ 6.0	
Statutory Payment	6.8	7.0	7.0	7.0	7.0	7.0	7.0	7.0	7.0	7.0	\$ 70.0	
Total State Revenue Sharing	\$ 6.8	\$ 7.0	\$ 7.0	\$ 7.0	\$ 7.0	\$ 7.0	\$ 7.0	\$ 7.0	\$ 10.0	\$ 10.1	\$ 76.0	

The City of Detroit recently saw its portion of State's revenue sharing decrease significantly, from a combined annual total of \$267 million in FY2009 to as low as \$173 million in FY2012. While the State's revenue sharing to Detroit has increased in FY2013 and FY2014, the City remains susceptible to decreases in revenue sharing should the State's budget position change.

Wagering Taxes

The City of Detroit, per the Michigan Gaming Control and Revenue Act, is authorized to impose a 10.9% wagering tax on casinos operating within the City. In addition, the City collects other fees from the casinos in the City based on operating

agreements with each. Wagering tax revenues are forecasted to account for 17% of General Fund revenue in the FY2014-2023 period.

	2014	2015	2016	2017	Preliminary forecast						2020	2021	2022	2023	10 Year Total
<u>Wagering Taxes Drivers</u>															
% Change in Gross Receipts	-2.5%	-1.0%	0.5%	0.5%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	0.3%
<u>Wagering Taxes Calculation</u>															
Adjusted Gross Receipts (A)															
MGM	\$ 565.4	\$ 559.7	\$ 562.5	\$ 565.3	\$ 571.0	\$ 576.7	\$ 582.5	\$ 588.3	\$ 594.2	\$ 600.1					\$ 5,765.8
Motorcity	445.6	441.2	443.4	445.6	450.0	454.5	459.1	463.7	468.3	473.0					\$ 4,544.4
Greektown	331.6	328.3	329.9	331.6	334.9	338.2	341.6	345.0	348.5	352.0					\$ 3,381.7
	<u>\$ 1,342.6</u>	<u>\$ 1,329.2</u>	<u>\$ 1,335.8</u>	<u>\$ 1,342.5</u>	<u>\$ 1,355.9</u>	<u>\$ 1,369.5</u>	<u>\$ 1,383.2</u>	<u>\$ 1,397.0</u>	<u>\$ 1,411.0</u>	<u>\$ 1,425.1</u>					<u>\$ 13,691.8</u>
Wagering Tax Rate (B)	10.9%	10.9%	10.9%	10.9%	10.9%	10.9%	10.9%	10.9%	10.9%	10.9%					
Additional Payment (per 2006 operating agreement)	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%					
Subtotal Wagering Tax (D) = (A)*(B+C)															
MGM	67.3	66.6	66.9	67.3	67.9	68.6	69.3	70.0	70.7	71.4					\$ 686.1
Motorcity	53.0	52.5	52.8	53.0	53.6	54.1	54.6	55.2	55.7	56.3					\$ 540.8
Greektown	39.5	39.1	39.3	39.5	39.9	40.3	40.7	41.1	41.5	41.9					\$ 402.4
Revenue Target Supplemental Wagering Tax (E)															
MGM	5.7	5.6	5.6	5.7	5.7	5.8	5.8	5.9	6.0	6.0					\$ 57.8
Motorcity	4.5	4.4	4.4	4.5	4.5	4.6	4.6	4.6	4.7	4.7					\$ 45.5
Greektown	-	-	-	-	-	-	-	-	-	-					\$ -
Total Wagering Tax (F) = (D+E)															
MGM	72.9	72.2	72.6	72.9	73.7	74.4	75.1	75.9	76.7	77.4					\$ 743.9
Motorcity	57.5	56.9	57.2	57.5	58.1	58.6	59.2	59.8	60.4	61.0					\$ 586.3
Greektown	<u>39.5</u>	<u>39.1</u>	<u>39.3</u>	<u>39.5</u>	<u>39.9</u>	<u>40.3</u>	<u>40.7</u>	<u>41.1</u>	<u>41.5</u>	<u>41.9</u>					<u>\$ 402.4</u>
Total Wagering Tax	<u>169.9</u>	<u>168.2</u>	<u>169.0</u>	<u>169.9</u>	<u>171.6</u>	<u>173.3</u>	<u>175.0</u>	<u>176.8</u>	<u>178.6</u>	<u>180.3</u>					<u>\$ 1,732.6</u>

As a result of the wagering tax rate (10.9%) and the additional 2006 tax rate (1.0%) being held constant, the key assumption in the 10 Yr forecast is the annual percentage change in casino gross receipts. The Detroit casinos have experienced increasing competition recently due to the openings of casinos in Cleveland and Toledo, Ohio resulting in declining wagering tax revenues for the City. The 10 Yr projections assume a 2.5% YoY decline in FY2014, a 1.0% decline in FY2015, a 0.5% annual increase in FY2016 and FY2017, and a 1.0% annual increase in FY2018-2023.

Through the first six calendar months of 2014, Detroit's aggregate casino revenues decreased 3.6% versus the same six month period in 2013. These actual results for the first six calendar months of 2014 represent a 110 basis points negative variance to the POA's FY2014 forecast and a 260 basis points negative variance to the FY2015 forecast.

Sensitivity Analysis

The following analysis illustrates the incremental impact of the City's actual Casino Wagering tax deviating from the assumptions in the 10 Yr projections. The analysis below estimates the impact of a 1% change, up or down, in the estimated casino gross receipts. The current projections assume casino gross receipts will average annual growth of 0.3% for FY2014-2023. Every 1 percentage point change in the gross receipts assumption will result in an approximate \$16 million variance in the FY2014-2023 period.

Preliminary forecast											10 Year Total
2014	2015	2016	2017	2018	2019	2020	2021	2022	2023		
<u>For Every 1% Change in Gross Receipts</u>											
Annual Impact on Total Wagering Tax	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.6	1.7	1.7	16.2

Sales and Charges for Services

Detroit receives revenues for City delivered-services such as maintenance and construction, recreation, ambulance services, court fees, permits and licenses, etc. Nearly half of these revenues are reflected as “Non Departmental” (e.g. municipal servicing fees on gross wagering revenues, personal services IPOs). Sales and Charges for Services revenues are forecasted to account for 11% of General Fund revenue in the FY2014-2023 period.

	2014	2015	2016	2017	Preliminary forecast						10 Year Total
					2018	2019	2020	2021	2022	2023	
Non-Departmental	51.8	51.7	52.1	52.6	53.1	53.6	54.1	54.7	55.2	55.7	534.7
PLD	41.2	28.7	26.1	23.5	20.8	18.1	15.3	12.3	10.6	10.7	207.2
Fire	14.9	14.9	14.9	14.9	14.9	14.9	14.9	14.9	14.9	14.9	149.0
36th District Court	10.0	10.0	10.0	10.0	10.0	10.0	10.0	10.0	10.0	10.0	100.3
Police	4.6	4.6	4.6	4.6	4.6	4.6	4.6	4.6	4.6	4.6	45.8
General Services	2.3	2.3	2.3	2.3	2.3	2.3	2.3	2.3	2.3	2.3	23.1
Human Resources	2.3	2.3	2.3	2.3	2.3	2.3	2.3	2.3	2.3	2.3	22.5
Law	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7	1.7	17.3
Health & Wellness	1.0	-	-	-	-	-	-	-	-	-	1.0
ITS	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	5.1
Other	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2	1.2	12.0
Sales and charges for services	\$ 131.5	\$ 118.0	\$ 115.8	\$ 113.6	\$ 111.4	\$ 109.2	\$ 107.0	\$ 104.4	\$ 103.3	\$ 104.0	\$ 1,118.0
YoY \$ Change	\$ 7.7	\$ (13.5)	\$ (2.2)	\$ (2.2)	\$ (2.2)	\$ (2.2)	\$ (2.2)	\$ (2.5)	\$ (1.1)	\$ 0.7	
YoY % Change	6.2%	-10.3%	-1.9%	-1.9%	-1.9%	-2.0%	-2.0%	-2.4%	-1.1%	0.6%	

During the ten year period, the largest change relates to transitioning responsibility for the City’s street lights from the PLD to the Public Lighting Authority beginning in FY2014. When the seven year transition is complete, the City will no longer collect revenue from external customers. The balance of the revenue categories are assumed to remain relatively constant over the FY2014-2023 time period.

Property Taxes

The City of Detroit levies property taxes to fund general operations and support various tax obligations. Detroit also levies additional property taxes to fund the Detroit Public Library, Detroit Public Schools, Wayne County Community College, the State of Michigan, and a number of special authorities.

City of Detroit Millage

- Non-Departmental (General City): 19.9520 mills
- Debt Service: 9.771 mills
- Library: 4.631 mills

Property tax revenues are forecasted to account for approximately 9% of General Fund revenue in the FY2014-2023 period. As previously mentioned, the City's Plan of Adjustment estimates revenues for the 10 year period covering FY2014-2023 both with and without the incremental revenue associated with the RRI's. The following analysis illustrates the "without RRI's" scenario.

10 Yr Projections - Without RRI's

The City's forecasted property tax revenues, due to the relatively-constant millage rates, are largely predicated upon the assumed changes in assessed property values and the estimated collection rates going forward.

Assessed Property Values

The 10 Yr projections assume individualized, average annual property value growth rates for each of the City's three property classifications: real property, personal property, and the Renaissance Zone. The 10 Yr projections assume real property values will decline 4% annually during the FY2014-2023 period, and personal property values will decline 0.3% for the same time period. The Renaissance Zone forecast assumes a 4.8% annual increase – aided by the 47% forecasted growth assumption in FY2014 which is consistent with the FY2012-2013 average.

Collection Rates

The POA forecast assumes improving property tax collections over the FY2014-2023 timeframe. The 10 Yr projections assume that collections for the non-departmental property taxes improve from an assumed 78% in FY2014 to 80% in FY2015-2019 to 84% in the last four years of this ten year period. Estimated collections for debt service is projected to decrease from an assumed 82% in FY2014 to 80% in FY2015-2019 to 84% in the last four years of this ten year period. Estimated collections for library property taxes are assumed to improve from 82% in FY2014-2016 to 84% in FY 2017 to 85% in FY2018-2023.

	2014	2015	2016	2017	Preliminary forecast						2023	10 Year Total
	2018	2019	2020	2021	2022	2023						
Change in assessed values												
Real Property	-6.4%	-14.0%	-3.8%	-2.7%	-2.4%	-2.3%	-9.6%	-0.1%	0.7%	0.7%		-4.0%
Personal Property	-1.5%	-1.2%	-1.1%	-0.7%	-0.2%	-0.1%	0.3%	0.3%	0.4%	0.4%		-0.3%
Renaissance Zone	47.3%	-11.8%	1.0%	1.0%	1.0%	1.5%	2.0%	2.0%	2.0%	2.0%		4.8%
Values												
Real Property	\$6,200.3	\$5,335.3	\$5,134.4	\$4,993.6	\$4,874.8	\$4,762.7	\$4,307.4	\$4,303.0	\$4,333.2	\$4,363.7		
Personal Property	<u>1,183.7</u>	<u>1,169.0</u>	<u>1,156.0</u>	<u>1,148.3</u>	<u>1,145.8</u>	<u>1,144.6</u>	<u>1,147.9</u>	<u>1,151.2</u>	<u>1,155.7</u>	<u>1,160.3</u>		
Total Valuation (for Non-Departmental & Library)	\$7,384.0	\$6,504.3	\$6,290.4	\$6,141.9	\$6,020.6	\$5,907.3	\$5,455.3	\$5,454.1	\$5,488.9	\$5,524.0		
Renaissance Zone	<u>917.2</u>	<u>809.1</u>	<u>817.2</u>	<u>825.4</u>	<u>833.7</u>	<u>846.2</u>	<u>863.1</u>	<u>880.4</u>	<u>898.0</u>	<u>915.9</u>		
Total Valuation (for Debt Service)	\$8,301.2	\$7,313.4	\$7,107.6	\$6,967.4	\$6,854.3	\$6,753.5	\$6,318.4	\$6,334.5	\$6,386.9	\$6,439.9		
Millage												
Non-Departmental (General City)	19.952	19.952	19.952	19.952	19.952	19.952	19.952	19.952	19.952	19.952		
Debt Service	9.771	10.699	10.143	10.343	10.311	10.013	10.060	9.896	7.030	6.270		
Library	4.631	4.631	4.631	4.631	4.631	4.631	4.631	4.631	4.631	4.631		
Adjusted tax levy												
Non-Departmental (General City)	\$ 147.3	\$ 128.2	\$ 124.0	\$ 121.0	\$ 118.6	\$ 116.4	\$ 107.3	\$ 107.3	\$ 108.0	\$ 108.7	\$	1,186.9
Debt Service	81.1	78.2	72.1	72.1	70.7	67.6	63.6	62.7	44.9	40.4		653.3
Library	34.2	30.1	29.1	28.4	27.9	27.4	25.3	25.3	25.4	25.6		278.6
Total	\$ 262.6	\$ 236.6	\$ 225.2	\$ 221.5	\$ 217.2	\$ 211.3	\$ 196.2	\$ 195.3	\$ 178.3	\$ 174.7	\$	2,118.9
Collection rate												
Non-Departmental (General City)	78.0%	80.0%	80.0%	80.0%	80.0%	80.0%	84.0%	84.0%	84.0%	84.0%		81.4%
Debt Service	82.0%	80.0%	80.0%	80.0%	80.0%	80.0%	84.0%	84.0%	84.0%	84.0%		81.8%
Library	82.0%	82.0%	82.0%	84.0%	85.0%	85.0%	85.0%	85.0%	85.0%	85.0%		84.0%
City collections												
Non-Departmental (General City) [A]	\$ 114.9	\$ 102.6	\$ 99.2	\$ 96.8	\$ 94.9	\$ 93.1	\$ 90.2	\$ 90.1	\$ 90.7	\$ 91.3	\$	963.8
Debt Service	66.5	62.6	57.7	57.6	56.5	54.1	53.4	52.7	37.7	33.9		532.8
Library	28.0	24.7	23.9	23.9	23.7	23.3	21.5	21.5	21.6	21.7		233.8
Total	\$ 209.5	\$ 189.9	\$ 180.7	\$ 178.4	\$ 175.1	\$ 170.4	\$ 165.0	\$ 164.3	\$ 150.0	\$ 147.0	\$	1,730.3
General fund collections [A]+[B]	\$ 114.9	\$ 102.6	\$ 99.2	\$ 96.8	\$ 94.9	\$ 93.1	\$ 90.2	\$ 90.1	\$ 90.7	\$ 91.3	\$	963.8

Components of Property Tax Value

	2014	2015	2016	2017	Preliminary forecast						2023	10 Year Total
	2018	2019	2020	2021	2022	2023						
Components of Property Taxable Value (non - RZ)												
Residential Property	3,948.1	3,138.7	2,981.7	2,862.5	2,748.0	2,638.0	2,176.4	2,165.5	2,187.2	2,209.0		
Real Property - Commercial	1,786.9	1,750.0	1,715.0	1,697.8	1,697.8	1,697.8	1,706.3	1,714.8	1,723.4	1,732.0		
Real Property - Industrial	<u>465.4</u>	<u>446.7</u>	<u>437.7</u>	<u>433.4</u>	<u>429.0</u>	<u>426.9</u>	<u>424.7</u>	<u>422.6</u>	<u>422.6</u>	<u>422.6</u>		
Total - Real Property	6,200.3	5,335.3	5,134.4	4,993.6	4,874.8	4,762.7	4,307.4	4,303.0	4,333.2	4,363.7		
Forecasted YoY Change - Real Property												
Residential Property	-7.4%	-20.5%	-5.0%	-4.0%	-4.0%	-4.0%	-17.5%	-0.5%	1.0%	1.0%		-6.1%
Real Property - Commercial	-5.0%	-2.1%	-2.0%	-1.0%	0.0%	0.0%	0.5%	0.5%	0.5%	0.5%		-0.8%
Real Property - Industrial	<u>-2.5%</u>	<u>-4.0%</u>	<u>-2.0%</u>	<u>-1.0%</u>	<u>-1.0%</u>	<u>-0.5%</u>	<u>-0.5%</u>	<u>-0.5%</u>	<u>0.0%</u>	<u>0.0%</u>		-1.2%
Total - Real Property	-6.4%	-14.0%	-3.8%	-2.7%	-2.4%	-2.3%	-9.6%	-0.1%	0.7%	0.7%		-4.0%
Personal Property - Commercial	529.5	524.1	513.6	508.5	508.5	508.5	511.0	513.6	516.2	518.7		
Personal Property - Industrial	290.4	253.7	251.2	248.7	246.2	244.9	243.7	242.5	242.5	242.5		
Personal Property - Utility	<u>363.7</u>	<u>391.2</u>	<u>391.2</u>	<u>391.2</u>	<u>391.2</u>	<u>391.2</u>	<u>393.1</u>	<u>395.1</u>	<u>397.1</u>	<u>399.0</u>		
Total - Personal Property	1,183.7	1,169.0	1,156.0	1,148.3	1,145.8	1,144.6	1,147.9	1,151.2	1,155.7	1,160.3		
Forecasted YoY Change - Personal Property												
Personal Property - Commercial	-3.8%	-1.0%	-2.0%	-1.0%	0.0%	0.0%	0.5%	0.5%	0.5%	0.5%		-0.6%
Personal Property - Industrial	3.2%	-12.6%	-1.0%	-1.0%	-1.0%	-0.5%	-0.5%	-0.5%	0.0%	0.0%		-1.4%
Personal Property - Utility	<u>-1.6%</u>	<u>7.5%</u>	<u>0.0%</u>	<u>0.0%</u>	<u>0.0%</u>	<u>0.0%</u>	<u>0.5%</u>	<u>0.5%</u>	<u>0.5%</u>	<u>0.5%</u>		0.8%
Total - Personal Property	-1.5%	-1.2%	-1.1%	-0.7%	-0.2%	-0.1%	0.3%	0.3%	0.4%	0.4%		-0.3%

10 YR Projections - With RRIs

Assessed Property Values

The 10 Yr projections – with RRIs - assumes real property values will decline 1.7% during the FY2014-2023 period, and personal property will increase by 0.9% during that same time period. The Renaissance Zone is forecasted to increase 4.8% annually during the ten year period – aided by the 47% forecasted growth assumption in FY2014.

In January 2014, the City launched a property tax assessment reform designed to make Detroit more attractive to current and prospective residents. As initial studies have indicated that significant portions of the City are over-assessed, the assessment reform is likely to result, in the near term, in reduced assessments and property tax revenues. This scenario is forecasted via an assumed 9% decline in real property assessments in FY2015 and a 3-4% drop in FY2015. The City believes that reduced assessments will result in improved property tax collection rates and, in the longer term, increased property values as Detroit becomes a more desirable location.

Collection Rates

The POA forecast assumes improving property tax collection over the FY2014-2023 timeframe. The 10 Yr projections assume collections for non-

departmental property taxes improve from a 78-82% range the 1st six years of the ten year period to 87% in the four years at the end of this period. The 10 Yr projections assume collections for debt service improve from a 78-82% range the 1st six years of the ten year period to 87% in the four years at the end of this period. Estimated collections for library property taxes are assumed to improve from 82% in FY2014-2016 to 84% in FY 2017 to 85% in FY2018-2023.

	2014	2015	2016	2017	Preliminary forecast						10 Year Total
					2018	2019	2020	2021	2022	2023	
Change in assessed values											
Real Property	-6.4%	-14.0%	-2.0%	-1.3%	0.0%	1.2%	-4.1%	2.8%	3.5%	3.5%	-1.7%
Personal Property	-1.5%	-1.2%	-0.3%	1.0%	1.0%	1.8%	1.8%	2.0%	2.2%	2.2%	0.9%
Renaissance Zone	47.3%	-11.8%	1.0%	1.0%	1.0%	1.5%	2.0%	2.0%	2.0%	2.0%	4.8%
Values											
Real Property	\$6,200.3	\$5,335.3	\$5,228.1	\$5,158.6	\$5,158.4	\$5,218.0	\$5,005.5	\$5,146.4	\$5,328.1	\$5,516.5	
Personal Property	<u>1,183.7</u>	<u>1,169.0</u>	<u>1,164.9</u>	<u>1,176.6</u>	<u>1,188.4</u>	<u>1,209.5</u>	<u>1,231.1</u>	<u>1,255.7</u>	<u>1,283.7</u>	<u>1,312.5</u>	
Total Valuation (for Non-Departmental & Library)	\$7,384.0	\$6,504.3	\$6,393.0	\$6,335.2	\$6,346.8	\$6,427.5	\$6,236.5	\$6,402.1	\$6,611.9	\$6,828.9	
Renaissance Zone	<u>917.2</u>	<u>809.1</u>	<u>817.2</u>	<u>825.4</u>	<u>833.7</u>	<u>846.2</u>	<u>863.1</u>	<u>880.4</u>	<u>898.0</u>	<u>915.9</u>	
Total Valuation (for Debt Service)	\$8,301.2	\$7,313.4	\$7,210.3	\$7,160.6	\$7,180.4	\$7,273.6	\$7,099.6	\$7,282.4	\$7,509.9	\$7,744.9	
Millage											
Non-Departmental (General City)	19.952	19.952	19.952	19.952	19.952	19.952	19.952	19.952	19.952	19.952	
Debt Service	9.771	10.699	9.999	9.818	9.603	9.070	8.645	8.311	5.773	5.034	
Library	4.631	4.631	4.631	4.631	4.631	4.631	4.631	4.631	4.631	4.631	
Adjusted tax levy											
Non-Departmental (General City)	\$ 147.3	\$ 128.2	\$ 126.0	\$ 124.8	\$ 125.1	\$ 126.6	\$ 122.8	\$ 126.1	\$ 130.2	\$ 134.5	\$ 1,291.8
Debt Service	81.1	78.2	72.1	70.3	69.0	66.0	61.4	60.5	43.4	39.0	640.9
Library	34.2	30.1	29.6	29.3	29.4	29.8	28.9	29.6	30.6	31.6	303.2
Total	\$ 262.6	\$ 236.6	\$ 227.7	\$ 224.5	\$ 223.4	\$ 222.4	\$ 213.1	\$ 216.3	\$ 204.2	\$ 205.1	\$ 2,235.9
Collection rate											
Non-Departmental (General City)	78.0%	80.0%	80.0%	82.0%	82.0%	82.0%	87.0%	87.0%	87.0%	87.0%	83.2%
Debt Service	82.0%	80.0%	80.0%	82.0%	82.0%	82.0%	87.0%	87.0%	87.0%	87.0%	83.6%
Library	82.0%	82.0%	82.0%	84.0%	85.0%	85.0%	85.0%	85.0%	85.0%	85.0%	84.0%
City collections											
Non-Departmental (General City) [A]	\$ 114.9	\$ 102.6	\$ 100.8	\$ 102.4	\$ 102.6	\$ 103.9	\$ 106.8	\$ 109.7	\$ 113.3	\$ 117.0	\$ 1,074.0
Debt Service	66.5	62.6	57.7	57.6	56.5	54.1	53.4	52.7	37.7	33.9	532.8
Library	28.0	24.7	24.3	24.6	25.0	25.3	24.5	25.2	26.0	26.9	254.6
Total	\$ 209.5	\$ 189.9	\$ 182.8	\$ 184.7	\$ 184.1	\$ 183.2	\$ 184.8	\$ 187.5	\$ 177.0	\$ 177.8	\$ 1,861.3
General fund collections [A]+[B]	\$ 114.9	\$ 102.6	\$ 100.8	\$ 102.4	\$ 102.6	\$ 103.9	\$ 106.8	\$ 109.7	\$ 113.3	\$ 117.0	\$ 1,074.0

Components of Property Tax Value

	2014	2015	2016	2017	Preliminary forecast						10 Year Total
					2018	2019	2020	2021	2022	2023	
<u>Components of Property Taxable Value (non - RZ)</u>											
Residential Property	3,948.1	3,138.7	3,044.5	2,953.2	2,908.9	2,923.4	2,660.3	2,740.1	2,849.7	2,963.7	
Real Property - Commercial	1,786.9	1,750.0	1,732.5	1,749.8	1,784.8	1,820.5	1,856.9	1,903.3	1,960.4	2,019.2	
Real Property - Industrial	465.4	446.7	451.1	455.7	464.8	474.1	488.3	502.9	518.0	533.6	
Total - Real Property	6,200.3	5,335.3	5,228.1	5,158.6	5,158.4	5,218.0	5,005.5	5,146.4	5,328.1	5,516.5	
<u>Forecasted YoY Change - Real Property</u>											
Residential Property	-7.4%	-20.5%	-3.0%	-3.0%	-1.5%	0.5%	-9.0%	3.0%	4.0%	4.0%	-3.3%
Real Property - Commercial	-5.0%	-2.1%	-1.0%	1.0%	2.0%	2.0%	2.0%	2.5%	3.0%	3.0%	0.7%
Real Property - Industrial	-2.5%	-4.0%	1.0%	1.0%	2.0%	2.0%	3.0%	3.0%	3.0%	3.0%	1.1%
Total - Real Property	-6.4%	-14.0%	-2.0%	-1.3%	0.0%	1.2%	-4.1%	2.8%	3.5%	3.5%	-1.7%
Personal Property - Commercial	529.5	524.1	513.6	518.8	523.9	534.4	545.1	558.7	575.5	592.8	
Personal Property - Industrial	290.4	253.7	256.3	258.8	261.4	264.0	266.7	269.3	272.0	274.7	
Personal Property - Utility	363.7	391.2	395.1	399.0	403.0	411.1	419.3	427.7	436.2	445.0	
Total - Personal Property	1,183.7	1,169.0	1,164.9	1,176.6	1,188.4	1,209.5	1,231.1	1,255.7	1,283.7	1,312.5	
<u>Forecasted YoY Change - Personal Property</u>											
Personal Property - Commercial	-3.8%	-1.0%	-2.0%	1.0%	1.0%	2.0%	2.0%	2.5%	3.0%	3.0%	0.8%
Personal Property - Industrial	3.2%	-12.6%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	-0.1%
Personal Property - Utility	-1.6%	7.5%	1.0%	1.0%	1.0%	2.0%	2.0%	2.0%	2.0%	2.0%	1.9%
Total - Personal Property	-1.5%	-1.2%	-0.3%	1.0%	1.0%	1.8%	1.8%	2.0%	2.2%	2.2%	0.9%

Sensitivity Analysis

The Sensitivity analysis below estimates the impact of a 1% change in the forecasted collection rate for each category of property classification in both the “with RRIs” and “without RRIs” scenarios.

	2014	2015	2016	2017	Preliminary forecast						FY2014-2023 Total
					2018	2019	2020	2021	2022	2023	
<u>For Every 1% Change in Annual Collection Rates</u>											
<u>Without Reinvestment</u>											
Real Property	1.5	1.3	1.2	1.2	1.2	1.2	1.1	1.1	1.1	1.1	11.9
Personal Property	0.8	0.8	0.7	0.7	0.7	0.7	0.6	0.6	0.4	0.4	6.5
Renaissance Zone	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	2.8
Total	2.6	2.4	2.3	2.2	2.2	2.1	2.0	2.0	1.8	1.7	21.2
<u>With Reinvestment</u>											
Real Property	1.5	1.3	1.3	1.2	1.3	1.3	1.2	1.3	1.3	1.3	12.9
Personal Property	0.8	0.8	0.7	0.7	0.7	0.7	0.6	0.6	0.4	0.4	6.4
Renaissance Zone	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	3.0
Total	2.6	2.4	2.3	2.2	2.2	2.2	2.1	2.2	2.0	2.1	22.4

For the Without RRIs scenario, every 1% change in the 10 Yr assumption will result in an approximate \$21 million change in collected income tax revenues in the

FY2014-2023 period. Due to higher property tax collection forecast in the With RRI's case, the estimated variance increases to \$22 million over that ten year period in question.

Utility Users' Taxes

The City of Detroit is the only city in Michigan authorized to levy a 5% utility users' excise tax. The City imposes this tax on consumers of telephone, electric, steam, and gas services. Utility users' tax revenues are forecasted to account for approximately 2% of General Fund revenue in the FY2014-2023 period.

	2014	2015	2016	2017	Preliminary forecast						2023	10 Year Total
					2018	2019	2020	2021	2022			
<u>WITHOUT REINVESTMENT</u>												
Utility users tax collections - Gross	\$ 37.0	\$ 37.0	\$ 37.0	\$ 37.4	\$ 37.8	\$ 38.2	\$ 38.6	\$ 38.9	\$ 39.3	\$ 39.7		\$ 381.0
Less: PLA transfer	(16.9)	(12.5)	(12.5)	(12.5)	(12.5)	(12.5)	(12.5)	(12.5)	(12.5)	(12.5)		(129.4)
Utility users tax collections - Net	\$ 20.1	\$ 24.5	\$ 24.5	\$ 24.9	\$ 25.3	\$ 25.7	\$ 26.1	\$ 26.4	\$ 26.8	\$ 27.2		\$ 251.6
YoY % Change	-43.0%	22.1%	0.0%	1.5%	1.5%	1.5%	1.5%	1.5%	1.5%	1.5%		-1.0%
<u>WITH REINVESTMENT</u>												
Utility users tax collections - Gross	\$ 37.0	\$ 37.0	\$ 37.4	\$ 38.0	\$ 38.5	\$ 38.9	\$ 39.3	\$ 39.7	\$ 40.1	\$ 40.5		\$ 386.6
Less: PLA transfer	(16.9)	(12.5)	(12.5)	(12.5)	(12.5)	(12.5)	(12.5)	(12.5)	(12.5)	(12.5)		(129.4)
Utility users tax collections - Net	\$ 20.1	\$ 24.5	\$ 24.9	\$ 25.5	\$ 26.0	\$ 26.4	\$ 26.8	\$ 27.2	\$ 27.6	\$ 28.0		\$ 257.2
YoY % Change	-43.0%	22.1%	1.5%	2.3%	2.2%	1.5%	1.5%	1.5%	1.5%	1.5%		-0.8%

Other Revenues

The City of Detroit annually generates revenues for City-services related to permits, licenses, parking fines, grant revenues, and 36th District Court fees. Grant revenue is comprised of approximately \$11 million in Fire Department SAFER grants in FY2015 and 2016, \$4-5 million annually in Police Department grants, with the balance related to Homeland Security, health initiatives, and the planning and

development department. Other revenues are forecasted to account for approximately 7% of General Fund revenue in the FY2014-2023 period.

	2014	2015	2016	2017	Preliminary forecast					2021	2022	2023	10 Year Total
					2018	2019	2020						
Parking/court fines and other revenue	\$ 29.2	\$ 29.2	\$ 29.2	\$ 29.2	\$ 29.2	\$ 29.2	\$ 29.2	\$ 29.2	\$ 29.2	\$ 29.2	\$ 29.2	\$ 29.2	\$ 291.9
YoY % Change	-7.1%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	-0.7%
Grant revenue	\$ 27.9	\$ 27.1	\$ 25.6	\$ 14.2	\$ 14.5	\$ 14.8	\$ 15.0	\$ 15.3	\$ 15.5	\$ 15.8	\$ 15.8	\$ 15.8	\$ 185.7
YoY % Change	-52.0%	-3.1%	-5.3%	-44.7%	2.5%	1.7%	1.7%	1.7%	1.6%	1.6%	1.6%	1.6%	-9.4%
Licenses, permits and inspection charges	\$ 9.0	\$ 9.1	\$ 9.1	\$ 9.1	\$ 9.2	\$ 9.2	\$ 9.3	\$ 9.3	\$ 9.3	\$ 9.3	\$ 9.4	\$ 9.4	\$ 92.0
YoY % Change	-15.5%	0.4%	0.4%	0.4%	0.4%	0.5%	0.5%	0.5%	0.5%	0.5%	0.5%	0.5%	-1.1%
Revenue from use of assets	\$ 4.1	\$ 11.7	\$ 5.2	\$ 5.2	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 47.6
YoY % Change	-64.3%	185.7%	-55.4%	0.0%	-31.9%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	3.4%
Other Taxes	\$ 9.6	\$ 9.6	\$ 9.6	\$ 9.6	\$ 9.6	\$ 9.6	\$ 9.6	\$ 9.6	\$ 9.6	\$ 9.6	\$ 9.6	\$ 9.6	\$ 95.6
YoY % Change	-16.7%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	-1.7%
Total - Other Revenue	\$ 79.8	\$ 86.6	\$ 78.7	\$ 67.3	\$ 66.0	\$ 66.3	\$ 66.6	\$ 66.9	\$ 67.2	\$ 67.5	\$ 67.5	\$ 67.5	\$ 712.8
	-28.6%	8.5%	-9.1%	-14.5%	-1.9%	0.4%	0.5%	0.4%	0.4%	0.4%	0.4%	0.4%	-4.3%

Section G - Operating Expenditures

Summary²⁶

The operating expenditures in the City of Detroit's POA 40 Yr Projections are summarized below:

<u>General Fund Operating Expenditures</u>	<u>FY2014-2023</u>		<u>FY2024-2033</u>		<u>FY2034-2043</u>		<u>FY2044-2053</u>	
Salaries/Overtime/Fringe	\$	3,768 47.3%	\$	4,612 48.8%	\$	5,700 48.1%	\$	7,121 47.5%
Health Benefits	\$	753 9.4%	\$	928 9.8%	\$	1,374 11.6%	\$	2,034 13.6%
Active Pension	\$	348 4.4%	\$	444 4.7%	\$	548 4.6%	\$	683 4.6%
OPEB Future Retirees	\$	32 0.4%	\$	37 0.4%	\$	43 0.4%	\$	51 0.3%
Other Operating Expenses	\$	3,073 38.5%	\$	3,437 36.3%	\$	4,190 35.3%	\$	5,108 34.1%
Total General Fund Operating Expenditures	\$	7,974 100.0%	\$	9,458 100.0%	\$	11,855 100.0%	\$	14,997 100.0%

The City's 10 Yr projections were developed by E&Y primarily to reflect the "baseline" financial condition of the City in the summer of 2013, assuming no changes in legacy obligations. These projections were prepared in significant detail and are the initial building block for the financial forecasts that are contained in the POA. The analysis below identifies the City's individual operating expense categories, the estimated growth for each category, and the key assumptions utilized. These expenditures exclude the expenditures related to the RRI's even though the

²⁶ Unless otherwise stated the financial projections referenced section G are sourced from the bibliography: Ernst & Young Models: 10-11

categories are similar. Section H includes the analysis of the expenditures associated with the RRIs.

The detailed operating expenditures in the 10 Yr forecast are as follows²⁷:

General Fund Operating Expenditures	FY2014-2023	
	\$	% of Costs
Salaries & Wages	\$ 3,165	39.7%
Health Benefits	\$ 753	9.4%
Overtime	\$ 326	4.1%
Other Benefits	\$ 278	3.5%
Active Pension	\$ 348	4.4%
OPEB Future Retirees	\$ 32	0.4%
Professional and contractual services	\$ 559	7.0%
Risk management and insurance	\$ 445	5.6%
Materials & supplies	\$ 376	4.7%
Utilities	\$ 296	3.7%
Purchased services	\$ 230	2.9%
Other expenses	\$ 359	4.5%
Maintenance capital	\$ 62	0.8%
Contributions to non enterprise funds	\$ 216	2.7%
DDOT subsidy	\$ 530	6.7%
Total General Fund Operating Expenditures General Fund	\$ 7,974	100.0%
Operating Surplus Prior to Legacy, Non Operating Expenses and RRI's	\$ 2,781	

²⁷ The analysis shows both estimates from the base 10 Yr plan and estimates from the 40 year plan including pension and OPEB payments to future retirees. The analysis was done to estimate a run rate operating surplus prior to accounting for the RRIs.

Salaries & Wages

Salaries and wages related to the General Fund were \$297.6 million in FY2013 and accounted for 40.4% of the City's estimated operating expenses. By FY2023, the City is projecting Salaries and Wages to represent 39.7% of operating expenses prior to the additional headcount from the RRI's.

Headcount

City-wide headcount in FY2013 was 10,043²⁸ versus the prior 5 year average of 12,610. The City projected headcount using the projected FY2013 headcount by department and assuming that headcount remained constant over the next ten years except for the following exceptions:

- Departments that are being outsourced including: DWDD, Human Services, PLD, Homeland Security and the majority of the Health and Wellness and City Council Departments. The City also adjusted some department headcount estimates higher or lower than FY2013 based on the most recent information from FY2014
- The Finance and HR department headcount reductions due to the implementation of a new payroll service in FY2017
- The Police and Fire Departments include projections for attrition and new hires beginning in FY2015

²⁸ The 2013 headcount is from the 10 Yr base model and was the estimated headcount when the financial model was initially prepared. The assumptions are based off of the projected headcount going forward. Actual headcount by department differs by this amount. The analysis in this section will reference the 2013 headcount in the base 10 Yr plan.

Total employees across all departments is projected to be 9,742 in FY2023 versus 10,043 in FY2013 or a 3.1% decrease. The average headcount from FY2008-FY2012 was 12,610 and the FY2023 headcount represents a 22.7% decrease from this level. Projected headcount by department:

Department	Preliminary Forecast									
	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Police	2,706	2,747	2,882	2,895	2,895	2,895	2,895	2,895	2,895	2,895
Fire	1,183	1,238	1,228	1,228	1,228	1,228	1,228	1,228	1,228	1,228
Transportation	978	1,048	1,065	1,065	1,065	1,065	1,065	1,065	1,065	1,065
Sewer	1,016	1,016	1,016	1,016	1,016	1,016	1,016	1,016	1,016	1,016
Water	873	873	873	873	873	873	873	873	873	873
36th District Court	362	362	362	362	362	362	362	362	362	362
Library	335	335	335	335	335	335	335	335	335	335
General Services	298	272	272	272	272	272	272	272	272	272
Waste	265	265	265	265	265	265	265	265	265	265
Streets	230	225	225	225	225	225	225	225	225	225
Finance	216	216	216	206	206	206	206	206	206	206
Recreation	202	202	202	202	202	202	202	202	202	202
BSED	192	192	192	192	192	192	192	192	192	192
Planning & Development	116	113	113	113	113	113	113	113	113	113
Parking	90	90	90	90	90	90	90	90	90	90
Law	86	86	86	86	86	86	86	86	86	86
Elections	80	60	60	60	60	60	60	60	60	60
Human Resources	84	84	84	60	60	60	60	60	60	60
ITS	35	38	38	38	38	38	38	38	38	38
Mayor	22	24	24	24	24	24	24	24	24	24
Public Works	14	19	19	19	19	19	19	19	19	19
Non-Departmental	21	17	17	17	17	17	17	17	17	17
Auditor General	17	17	17	17	17	17	17	17	17	17
Budget	16	16	16	16	16	16	16	16	16	16
City Clerk	15	15	15	15	15	15	15	15	15	15
Zoning	11	11	11	11	11	11	11	11	11	11
City Council	9	10	10	10	10	10	10	10	10	10
Health & Wellness	14	9	9	9	9	9	9	9	9	9
Ombudsperson	6	6	6	6	6	6	6	6	6	6
Human Rights	5	5	5	5	5	5	5	5	5	5
Airport	5	5	5	5	5	5	5	5	5	5
Administrative Hearings	4	4	4	4	4	4	4	4	4	4
PLD	70	12	7	5	3	3	3	2	-	-
Total	9,578	9,634	9,770	9,747	9,745	9,745	9,745	9,744	9,742	9,742

A comparison of FY2023 with FY2013 headcount for the General Fund and Enterprise Funds is shown below:

<u>General Fund</u>	<u>Headcount</u>			<u>Enterprise Funds</u>	<u>Headcount</u>		
	<u>2023</u>	<u>2013</u>	<u>Var</u>		<u>2023</u>	<u>2013</u>	<u>Var</u>
Police	2,895	2,909	(14)	DDOT	1,065	1,060	5
Fire	1,228	1,189	39	Sewer	1,016	1,016	-
36th District Court	362	362	-	Water	873	873	-
General Services	272	298	(26)	Library	335	335	-
Waste	265	265	0	Streets	225	199	26
Finance	206	228	(22)	BSED	192	192	-
Recreation	202	202	-	Parking	90	90	-
Planning & Development	113	116	(3)	Airport	5	5	-
Law	86	86	-	Total Enterprise Funds	3,802	3,772	31
Elections	60	80	(20)				
Human Resources	60	93	(33)				
ITS	38	35	3				
Mayor	24	22	2				
Public Works	19	41	(22)				
Non-Departmental	17	21	(4)				
Auditor General	17	14	3				
Budget	16	16	-				
City Clerk	15	15	-				
Zoning	11	11	-				
City Council	10	46	(36)				
Health & Wellness	9	80	(71)				
Ombudsperson	6	6	-				
Human Rights	5	5	-				
Administrative Hearings	4	4	-				
DWDD	-	7	(7)				
Homeland Security	-	1	(1)				
Human Services	-	22	(22)				
PLD	-	99	(99)				
Total General Fund	5,940	6,271	(331)				

Average Salary

The City calculated departmental salaries and wages by using the headcount projections above and calculating a base average salary by department. The City determined the base average salary via two methods:

- The City calculated the average departmental salary by using the total FY2013 expense for salaries and wages by department and divided that by the average headcount of the department over the course of FY2013.
- The City analyzed each department's average salary at a point in time, conducting this analysis in November of 2013.

The City's advisors reviewed both estimates with each department head and selected the average salary that was considered the most reasonable going forward based on attrition estimates and estimated future hirings.

City-wide 10% wage reductions were implemented prior to FY2014 for the majority of employees. The Fire and Police departments FY2014 average salaries were adjusted by 4.1% and 2.1% in the projections respectively to account for 10% wage reductions for the remaining employees with contracts that expired in FY2013.

It should be noted that the baseline 10 Yr model used average salaries for the Fire and Police departments even though employees leaving via attrition will be replaced by employees at lower wages and new employees will most likely be entry level employees at lower salary levels. This assumption change was made recently and adjusted in the July 2, 2014 RRIs for each respective department. The add backs can be seen in Section H. The average wages also include a 10% wage reduction to 36th District Court employees from FY2013 levels in 2014. For all employees, wage inflation is assumed with the following schedule:

Year	YoY Change
2015	5.0%
2016	0.0%
2017	2.5%
2018	2.5%
2019	2.5%
2020	2.0%
2021	2.0%
2022	2.0%
2023	2.0%

Projected average salary by department by year:

Department	Preliminary Forecast										
	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	
Police	\$ 51,514	\$ 54,454	\$ 54,454	\$ 55,816	\$ 57,211	\$ 58,641	\$ 59,814	\$ 61,010	\$ 62,231	\$ 63,475	
Fire	\$ 55,950	\$ 58,747	\$ 58,747	\$ 60,216	\$ 61,721	\$ 63,264	\$ 64,530	\$ 65,820	\$ 67,137	\$ 68,479	
Transportation	\$ 30,767	\$ 32,306	\$ 32,306	\$ 33,113	\$ 33,941	\$ 34,790	\$ 35,486	\$ 36,195	\$ 36,919	\$ 37,658	
Sewer	\$ 56,127	\$ 58,933	\$ 58,933	\$ 60,406	\$ 61,916	\$ 63,464	\$ 64,734	\$ 66,028	\$ 67,349	\$ 68,696	
Water	\$ 40,481	\$ 42,505	\$ 42,505	\$ 43,568	\$ 44,657	\$ 45,774	\$ 46,689	\$ 47,623	\$ 48,575	\$ 49,547	
36th District Court	\$ 46,252	\$ 48,564	\$ 48,564	\$ 49,779	\$ 51,023	\$ 52,299	\$ 53,345	\$ 54,411	\$ 55,500	\$ 56,610	
Library	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	
General Services	\$ 33,501	\$ 35,176	\$ 35,176	\$ 36,056	\$ 36,957	\$ 37,881	\$ 38,639	\$ 39,412	\$ 40,200	\$ 41,004	
Waste	\$ 33,188	\$ 34,847	\$ 34,847	\$ 35,718	\$ 36,611	\$ 37,527	\$ 38,277	\$ 39,043	\$ 39,823	\$ 40,620	
Streets	\$ 33,188	\$ 34,847	\$ 34,847	\$ 35,718	\$ 36,611	\$ 37,527	\$ 38,277	\$ 39,043	\$ 39,823	\$ 40,620	
Finance	\$ 45,415	\$ 47,685	\$ 47,685	\$ 48,878	\$ 50,099	\$ 51,352	\$ 52,379	\$ 53,427	\$ 54,495	\$ 55,585	
Recreation	\$ 16,904	\$ 17,749	\$ 17,749	\$ 18,193	\$ 18,648	\$ 19,114	\$ 19,496	\$ 19,886	\$ 20,284	\$ 20,690	
BSED	\$ 47,306	\$ 49,672	\$ 49,672	\$ 50,913	\$ 52,186	\$ 53,491	\$ 54,561	\$ 55,652	\$ 56,765	\$ 57,900	
Planning & Development	\$ 53,640	\$ 56,322	\$ 56,322	\$ 57,730	\$ 59,173	\$ 60,652	\$ 61,865	\$ 63,103	\$ 64,365	\$ 65,652	
Parking	\$ 33,594	\$ 35,274	\$ 35,274	\$ 36,156	\$ 37,060	\$ 37,986	\$ 38,746	\$ 39,521	\$ 40,312	\$ 41,118	
Law	\$ 71,497	\$ 75,072	\$ 75,072	\$ 76,949	\$ 78,873	\$ 80,844	\$ 82,461	\$ 84,111	\$ 85,793	\$ 87,509	
Elections	\$ 27,971	\$ 29,370	\$ 29,370	\$ 30,104	\$ 30,856	\$ 31,628	\$ 32,260	\$ 32,906	\$ 33,564	\$ 34,235	
Human Resources	\$ 49,727	\$ 52,213	\$ 52,213	\$ 53,519	\$ 54,857	\$ 56,228	\$ 57,353	\$ 58,500	\$ 59,670	\$ 60,863	
ITS	\$ 57,494	\$ 60,369	\$ 60,369	\$ 61,878	\$ 63,425	\$ 65,011	\$ 66,311	\$ 67,637	\$ 68,990	\$ 70,369	
Mayor	\$ 92,861	\$ 97,504	\$ 97,504	\$ 99,942	\$ 102,440	\$ 105,001	\$ 107,101	\$ 109,243	\$ 111,428	\$ 113,657	
Public Works	\$ 46,029	\$ 41,811	\$ 41,811	\$ 42,856	\$ 43,927	\$ 45,025	\$ 45,926	\$ 46,844	\$ 47,781	\$ 48,737	
Non-Departmental	\$ 80,395	\$ 84,414	\$ 84,414	\$ 86,525	\$ 88,688	\$ 90,905	\$ 92,723	\$ 94,578	\$ 96,469	\$ 98,399	
Auditor General	\$ 65,304	\$ 68,569	\$ 68,569	\$ 70,283	\$ 72,041	\$ 73,842	\$ 75,318	\$ 76,825	\$ 78,361	\$ 79,928	
Budget	\$ 64,173	\$ 67,381	\$ 67,381	\$ 69,066	\$ 70,792	\$ 72,562	\$ 74,013	\$ 75,494	\$ 77,003	\$ 78,544	
City Clerk	\$ 46,300	\$ 48,615	\$ 48,615	\$ 49,831	\$ 51,076	\$ 52,353	\$ 53,400	\$ 54,468	\$ 55,558	\$ 56,669	
Zoning	\$ 25,120	\$ 26,376	\$ 26,376	\$ 27,035	\$ 27,711	\$ 28,404	\$ 28,972	\$ 29,551	\$ 30,142	\$ 30,745	
City Council	\$ 68,378	\$ 71,500	\$ 71,500	\$ 73,288	\$ 75,120	\$ 76,998	\$ 78,538	\$ 80,108	\$ 81,711	\$ 83,345	
Health & Wellness	\$ 60,946	\$ 73,547	\$ 73,547	\$ 75,386	\$ 77,270	\$ 79,202	\$ 80,786	\$ 82,402	\$ 84,050	\$ 85,731	
Ombudsperson	\$ 81,064	\$ 85,117	\$ 85,117	\$ 87,245	\$ 89,426	\$ 91,662	\$ 93,495	\$ 95,365	\$ 97,272	\$ 99,217	
Human Rights	\$ 57,093	\$ 59,948	\$ 59,948	\$ 61,447	\$ 62,983	\$ 64,558	\$ 65,849	\$ 67,166	\$ 68,509	\$ 69,879	
Airport	\$ 64,882	\$ 68,126	\$ 68,126	\$ 69,829	\$ 71,575	\$ 73,364	\$ 74,832	\$ 76,328	\$ 77,855	\$ 79,412	
Administrative Hearings	\$ 82,422	\$ 86,544	\$ 86,544	\$ 88,707	\$ 90,925	\$ 93,198	\$ 95,062	\$ 96,963	\$ 98,902	\$ 100,881	
PLD	\$ 49,211	\$ 84,190	\$ 81,474	\$ 79,817	\$ 79,591	\$ 81,182	\$ 82,806	\$ 84,462	\$ -	\$ -	

Department Salaries and Wages

The Police and Fire departments represent 76.5% of total salaries and wages in the General Fund. The following charts summarize the salaries and wages by department over the 10 year period for labor costs reflected in the General Fund and the Enterprise Funds:

Salaries and Wages - General Fund				Salaries and Wages - All Other Funds		
General Fund	FY 2014-2023	% of Salaries	% of Revenue	All Other Funds	FY 2014-2023	% of Salaries
Police	\$ 1,654	52.3%	14.7%	Sewer	\$ 637	36.1%
Fire	\$ 765	24.2%	6.8%	Water	\$ 395	22.4%
36th District Court	\$ 187	5.9%	1.7%	DDOT	\$ 363	20.5%
Finance	\$ 106	3.3%	0.9%	Waste	\$ 98	5.6%
General Services	\$ 103	3.2%	0.9%	BSED	\$ 96	5.5%
Law	\$ 68	2.2%	0.6%	Streets	\$ 84	4.7%
Recreation	\$ 38	1.2%	0.3%	Planning & Development	\$ 61	3.5%
Human Resources	\$ 37	1.2%	0.3%	<u>All Other Depts.</u>	<u>\$ 31</u>	<u>1.8%</u>
Planning & Development	\$ 31	1.0%	0.3%	Total Other Funds	\$ 1,765	100.0%
Mayor	\$ 25	0.8%	0.2%			
ITS	\$ 24	0.8%	0.2%			
<u>All Other GF Depts.</u>	<u>\$ 127</u>	<u>4.0%</u>	<u>1.1%</u>			
Total General Fund	\$ 3,165	100.0%	28.2%			

Following FY2023, the City projects total salaries and wages will increase 2% a year from FY2024-FY2033 and 2.25% a year from FY2034-FY2053.

Health Benefits

Health benefits for active employees in the General Fund in FY2013 totaled \$47.8 million or 6.5% of operating expenses. Over the next ten years the city is estimating Health Benefits to account for 9.4% of operating expenses. The City relied on their actuary, Milliman, Inc.²⁹, to project health care costs per active employee. Milliman's estimated FY2014 healthcare costs are based on headcount estimates provided by the City and reflect cost of healthcare plan designs offered for FY2014 enrollment:

²⁹ See Milliman Letter Re: City of Detroit Active Health Plan Projections Dated November 3, 2014.

FY2014									
Milliman Per Employee Estimate									
	Headcount	Medical	Dental	Vision	Total		2014 Total		
Uniform	3,957	\$ 8,459	\$ 667	\$ 79	\$ 9,205	\$	36		
General	2,532	\$ 7,378	\$ 667	\$ 79	\$ 8,124	\$	21		
DOT	936	\$ 9,087	\$ 667	\$ 87	\$ 9,841	\$	9		
Water/Sewer	1,815	\$ 7,675	\$ 667	\$ 79	\$ 8,421	\$	15		
Library	384	\$ 6,695	\$ 667	\$ 79	\$ 7,441	\$	3		
Total	9,624					\$	84		

Milliman projected estimates for year over year percent changes in healthcare costs per employee from FY2015 thru FY2019. After FY2019 the City projected annual healthcare increases. The City estimated 4% a year in annual inflation in healthcare costs for FY2020 through FY2023.

	Milliman Letter Estimates					City Estimates			
	2015	2016	2017	2018	2019	2020	2021	2022	2023
Uniform	-2.1%	6.8%	7.0%	7.3%	6.0%	4.0%	4.0%	4.0%	4.0%
General	-4.4%	6.8%	7.1%	7.3%	6.0%	4.0%	4.0%	4.0%	4.0%
DOT	-11.3%	6.7%	7.0%	7.3%	6.0%	4.0%	4.0%	4.0%	4.0%
Water/Sewer	-1.3%	6.8%	7.0%	7.3%	6.0%	4.0%	4.0%	4.0%	4.0%
Library	-2.8%	6.5%	7.1%	7.3%	6.0%	4.0%	4.0%	4.0%	4.0%
36th DC	-4.0%	6.7%	7.0%	7.3%	6.0%	4.0%	4.0%	4.0%	4.0%

Health benefits in the General Fund include \$142.8³⁰ million of OPEB payments for current retirees including \$123.8 million in FY2014 and \$19 million in FY2015. The City continued to pay healthcare costs for retirees after filing bankruptcy in the form of a stipend. The total amount projected to be paid was deducted when calculating total recovery for the OPEB claim via UTGO Note A.

³⁰ Total payments to current retirees in the financial model is actually \$162.8 million. This amount includes \$20 million considered recovered after negotiations and it is paid in cash under the sources section in the 40 Yr model along with other unsecured creditors.

The following chart shows the total projected health benefit expenses in the General Fund in FY2014-FY2023:

Preliminary Forecast											
General Fund Active Health Benefits	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
General Fund Active Employees	\$ 49.2	\$ 48.0	\$ 52.4	\$ 55.9	\$ 60.0	\$ 63.6	\$ 66.1	\$ 68.7	\$ 71.5	\$ 74.3	\$ 609.8
OPEB Payments for Current Retirees	\$ 123.8	\$ 19.0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 142.8
Total General Fund	\$ 173.0	\$ 67.1	\$ 52.4	\$ 55.9	\$ 60.0	\$ 63.6	\$ 66.1	\$ 68.7	\$ 71.5	\$ 74.3	\$ 752.6

Overtime

Overtime accounted for \$29.7 million in the General Fund in FY2013 which was 4% of total operating expenditures and 10% of payroll. The City assumed that overtime in the projections as a percentage of payroll stays constant from FY2013 except for a few exceptions:

- Overtime in the Fire department increases from 7% in FY2013 to 8.5% in FY2014 and finally decreases to 6% from FY2015-FY2023. The Fire Department overtime levels were down from the FY2008-FY2012 average of 13.4% to 7% in FY2013 as the Fire Department has been successful in reducing overtime due to better staffing model. Additional overtime reductions for the department are reflected in section H.
- Overtime in the Police Department is expected to increase from 12% in FY2013 to 15% in FY2014 and FY2015 and back to 14% in FY2016-FY2023. The expected increase is a result of changing from 12 hour shifts to 8 hour shifts.
- Overtime for DDOT is projected to decrease to 40% of payroll versus 42.8% in FY2013. The overtime for DDOT in operating expenditures does not account for projected overtime decreases due to additional hires in DDOT and updates to its existing bus fleet that reduce overtime by a considerable amount. The reduction in overtime can be seen in Section H.

The chart below highlights overtime across all departments as a percentage of total department payroll:

Department	Preliminary Forecast										
	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Police	12.0%	15.0%	15.0%	14.0%	14.0%	14.0%	14.0%	14.0%	14.0%	14.0%	14.0%
Fire	7.0%	8.5%	6.0%	6.0%	6.0%	6.0%	6.0%	6.0%	6.0%	6.0%	6.0%
Transportation	42.8%	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%
Sewer	19.9%	19.9%	19.9%	19.9%	19.9%	19.9%	19.9%	19.9%	19.9%	19.9%	19.9%
Water	18.5%	18.5%	18.5%	18.5%	18.5%	18.5%	18.5%	18.5%	18.5%	18.5%	18.5%
36th District Court	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%	0.8%
General Services	22.9%	22.9%	22.9%	22.9%	22.9%	22.9%	22.9%	22.9%	22.9%	22.9%	22.9%
Waste	26.0%	26.0%	26.0%	26.0%	26.0%	26.0%	26.0%	26.0%	26.0%	26.0%	26.0%
Streets	8.6%	8.6%	8.6%	8.6%	8.6%	8.6%	8.6%	8.6%	8.6%	8.6%	8.6%
Finance	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%
Recreation	3.1%	3.1%	3.1%	3.1%	3.1%	3.1%	3.1%	3.1%	3.1%	3.1%	3.1%
BSED	3.9%	3.9%	3.9%	3.9%	3.9%	3.9%	3.9%	3.9%	3.9%	3.9%	3.9%
Planning & Development	1.9%	1.9%	1.9%	1.9%	1.9%	1.9%	1.9%	1.9%	1.9%	1.9%	1.9%
Parking	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%	0.2%
Law	1.5%	1.5%	1.5%	1.5%	1.5%	1.5%	1.5%	1.5%	1.5%	1.5%	1.5%
Elections	20.8%	22.4%	10.6%	10.6%	10.6%	10.6%	10.6%	10.6%	10.6%	10.6%	10.6%
Human Resources	4.8%	4.8%	4.8%	4.8%	4.8%	4.8%	4.8%	4.8%	4.8%	4.8%	4.8%
ITS	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%	4.3%
Mayor	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Public Works	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%	7.3%
Non-Departmental	4.7%	4.7%	4.7%	4.7%	4.7%	4.7%	4.7%	4.7%	4.7%	4.7%	4.7%
Auditor General	2.4%	2.4%	2.4%	2.4%	2.4%	2.4%	2.4%	2.4%	2.4%	2.4%	2.4%
Budget	2.7%	2.7%	2.7%	2.7%	2.7%	2.7%	2.7%	2.7%	2.7%	2.7%	2.7%
City Clerk	0.1%	0.1%	0.1%	0.1%	0.1%	0.1%	0.1%	0.1%	0.1%	0.1%	0.1%
Zoning	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
City Council	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Health & Wellness	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%	0.6%
Ombudsperson	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Human Rights	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Airport	0.5%	0.5%	0.5%	0.5%	0.5%	0.5%	0.5%	0.5%	0.5%	0.5%	0.5%
Administrative Hearings	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
PLD	49.8%	29.9%	10.0%	10.0%	10.0%	10.0%	10.0%	10.0%	10.0%	10.0%	10.0%

The chart below highlights General Fund overtime paid over the ten year period:

General Fund Overtime		
Department	10 Year Total	% of Overtime
Police	235	72%
Fire	48	15%
General Services	24	7%
Finance	8	2%
All Other GF Depts.	12	4%
Total Overtime	\$ 326	100%

The majority of overtime in the General Fund is driven by Police, Fire and General Services. Overtime for DDOT is projected to be \$145 million over the 10

year period. Although DDOT is not funded by the General Fund, the General Fund does provide a subsidy to DDOT as it has historically operated at a deficit. Overtime for the majority of departments has decreased from the FY2008-FY2012 average. If the current assumptions are understated and actual overtime reverts back to FY2008-FY2012 levels, the overtime costs could increase as shown below:

Department	2008-2012 Avg	10 Yr Avg	Var	Additional OT	
				Over 10 Yrs at 08-12 Avg	
Police	15.0%	14.2%	0.8%		14
Fire	13.4%	6.3%	7.1%		55
DDOT	44.6%	40.0%	4.6%		17
Total				\$	85

Other Benefits

Other benefits including social security, unemployment and life insurance totaled \$34 million in the General Fund in FY2013 representing 4.6% of operating expenses and 11.4% of payroll. The City projected other benefits by calculating the FY2013 cost per employee for each benefit and multiplying it by the number of employees projected in FY2014. For the Fire and Police Departments, which have both uniform and civilian employees, the City calculated the uniform employees at the Police or Fire Department per employee cost and civilians at the General City per employee cost. The analysis below highlights the calculations the City made regarding fringe benefits:

Benefit Per Head	Fire	Police	DOT	Gen City	BSED	36DC	Sewer	Water	Library
<u>As a % of Payroll</u>									
Emp Benefits-Social Security	0.00%	0.00%	7.65%	7.65%	7.65%	7.65%	7.65%	7.65%	7.65%
<u>Per Head Cost</u>									
Unemployment	\$ -	\$ -	\$ 400	\$ 1,900	\$ 200	\$ -	\$ 200	\$ 125	\$ 100
Misc Benefits	\$ 23	\$ 23	\$ 20	\$ 52	\$ 87	\$ -	\$ 30	\$ 50	\$ 38
Unused Sick Leave	\$ 3,892	\$ 1,424	\$ 100	\$ 991	\$ 650	\$ -	\$ 1,025	\$ 1,026	\$ 298
Longevity	\$ -	\$ -	\$ 257	\$ -	\$ -	\$ 491	\$ -	\$ -	\$ 388
Group Life Insurance	\$ 802	\$ 802	\$ 287	\$ 287	\$ 287	\$ 1,053	\$ 287	\$ 287	\$ 287
Income Protection	\$ -	\$ -	\$ 244	\$ 37	\$ 31	\$ 614	\$ 34	\$ 60	\$ 36
DOT Sick & Accident	\$ -	\$ -	\$ 802	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Total Benefit Per Head	\$ 4,717	\$ 2,249	\$ 2,109	\$ 3,266	\$ 1,254	\$ 2,158	\$ 1,575	\$ 1,548	\$ 1,146

Total Fringe Benefits	Fire	Police	DOT	Gen City	BSED	36DC	Sewer	Water	Library
<u>FY13 Heads (estimated)</u>									
Uniform	917	2,632	n/a	n/a	n/a	n/a	n/a	n/a	n/a
Civilian	271	277	1,060	2,107	192	362	1,016	873	335
<u>FY13 Payroll (estimated)</u>									
Uniform	\$ 53,491,447	\$ 138,515,971							
Civilian	\$ 15,813,821	\$ 14,577,797	\$ 30,283,777	\$ 80,289,491	\$ 7,844,088	\$ 18,577,833	\$ 33,315,825	\$ 34,893,517	\$ -
Heads x per head costs	\$ 4,898,103	\$ 6,503,401	\$ 2,235,541	\$ 6,882,139	\$ 241,370	\$ 780,081	\$ 1,601,205	\$ 1,352,018	\$ 383,974
Payroll x % of payroll costs	\$ 1,209,757	\$ 1,115,201	\$ 2,316,709	\$ 6,142,146	\$ 600,073	\$ 1,421,204	\$ 2,548,661	\$ 2,669,354	\$ -
Total fringe costs	\$ 6,421,533	\$ 7,939,065	\$ 4,552,250	\$ 13,024,285	\$ 841,443	\$ 2,201,285	\$ 4,149,865	\$ 4,021,372	\$ 383,974
Fringe costs as % of payroll	9.3%	5.2%	15.0%	16.2%	10.7%	11.8%	12.5%	11.5%	n/a

Going forward, the City assumed fringe benefits as a percent of payroll would stay constant. As a result, fringe benefits increase at the same rate as wage inflation projected in the forecast. In addition to fringe benefits, the City included a one-time 3% bonus in FY2016 to all uniformed employees and a one-time 2.5% bonus to non-uniformed employees. Below summarizes the General Fund cost for fringe benefits by year including the bonus payments:

Fringe Benefits	Preliminary Forecast										
	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
PFRS	\$ 13.4	\$ 14.5	\$ 14.8	\$ 15.2	\$ 15.6	\$ 16.0	\$ 16.3	\$ 16.6	\$ 17.0	\$ 17.3	\$ 156.6
General	\$ 8.6	\$ 8.8	\$ 8.7	\$ 8.6	\$ 8.8	\$ 9.0	\$ 9.2	\$ 9.4	\$ 9.5	\$ 9.7	\$ 90.4
36 District Court	\$ 2.0	\$ 2.1	\$ 2.1	\$ 2.1	\$ 2.2	\$ 2.2	\$ 2.3	\$ 2.3	\$ 2.4	\$ 2.4	\$ 22.1
Total General Fund	\$ 23.9	\$ 25.4	\$ 25.6	\$ 26.0	\$ 26.6	\$ 27.3	\$ 27.8	\$ 28.3	\$ 28.9	\$ 29.5	\$ 269.2
One Time 2.5% Bonus to AFSCME			\$ 1.8								\$ 1.8
One Time 3% Bonus to all Uniform			\$ 6.9								\$ 6.9
Total General Fund Fringe Benefits	\$ 23.9	\$ 25.4	\$ 34.3	\$ 26.0	\$ 26.6	\$ 27.3	\$ 27.8	\$ 28.3	\$ 28.9	\$ 29.5	\$ 277.9

Active Pension

The city is establishing a new hybrid pension plan for its active employees. Details regarding the new pension plan are discussed in Section J. The City assumed the following contributions per employee group as a percentage of payroll based on the most recent negotiations:

	<u>Contribution %</u>
Non Public Safety	5.75%
Public Safety	12.25%
PLSA	12.25%

The chart below summarizes the City's yearly estimated contributions to the pension plan:

<u>Preliminary Forecast</u>											
Active Pension	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
Non Public Safety Payroll	\$ 69.8	\$ 71.9	\$ 69.8	\$ 71.3	\$ 72.9	\$ 74.7	\$ 76.2	\$ 77.7	\$ 79.1	\$ 80.6	\$ 744.1
DDOT Payroll	\$ 30.1	\$ 33.9	\$ 34.4	\$ 35.3	\$ 36.1	\$ 37.1	\$ 37.8	\$ 38.5	\$ 39.3	\$ 40.1	\$ 362.6
Total Non Uniform Payroll	\$ 99.9	\$ 105.8	\$ 104.2	\$ 106.6	\$ 109.1	\$ 111.8	\$ 114.0	\$ 116.2	\$ 118.4	\$ 120.7	\$ 1,106.7
Non Public Safety Contribution	5.75%	5.75%	5.75%	5.75%	5.75%	5.75%	5.75%	5.75%	5.75%	5.75%	5.75%
Non Public Safety Active Pension	\$ 5.7	\$ 6.1	\$ 6.0	\$ 6.1	\$ 6.3	\$ 6.4	\$ 6.6	\$ 6.7	\$ 6.8	\$ 6.9	\$ 63.6
Police Payroll (Excluding DPLSA)	\$ 102.0	\$ 110.4	\$ 117.7	\$ 121.4	\$ 124.4	\$ 127.5	\$ 130.1	\$ 132.7	\$ 135.3	\$ 138.0	\$ 1,239.4
Police Contribution	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%
Police Active Pension	\$ 12.5	\$ 13.5	\$ 14.4	\$ 14.9	\$ 15.2	\$ 15.6	\$ 15.9	\$ 16.3	\$ 16.6	\$ 16.9	\$ 151.8
Fire Payroll	\$ 66.2	\$ 72.7	\$ 72.1	\$ 73.9	\$ 75.8	\$ 77.7	\$ 79.2	\$ 80.8	\$ 82.4	\$ 84.1	\$ 765.1
Fire Contribution	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%
Fire Active Pension	\$ 8.1	\$ 8.9	\$ 8.8	\$ 9.1	\$ 9.3	\$ 9.5	\$ 9.7	\$ 9.9	\$ 10.1	\$ 10.3	\$ 93.7
DPLSA	\$ 37.1	\$ 39.0	\$ 39.0	\$ 39.9	\$ 40.9	\$ 42.0	\$ 42.8	\$ 43.6	\$ 44.5	\$ 45.4	\$ 414.2
DPLSA Contribution	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%	12.25%
DPLSA Active Pension	\$ 4.5	\$ 4.8	\$ 4.8	\$ 4.9	\$ 5.0	\$ 5.1	\$ 5.2	\$ 5.3	\$ 5.5	\$ 5.6	\$ 50.7
Adjustment Year 1	\$ (12.1)										\$ (12.1)
Active Pension Contribution	\$ 18.8	\$ 33.3	\$ 34.0	\$ 34.9	\$ 35.8	\$ 36.7	\$ 37.4	\$ 38.2	\$ 38.9	\$ 39.7	\$ 347.8

Active OPEB

The city is establishing a Voluntary Employment Benefit Account ("VEBA") for its active employees' future healthcare costs. The City assumed a contribution

of \$1 million per year to PFRS and 2% of payroll for non-uniform employees based on the most recent negotiations. Summarized below is the City's yearly estimated contribution to the VEBA:

Preliminary Forecast											
Active OPEB	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
Non Public Safety Payroll	\$ 69.8	\$ 71.9	\$ 71.5	\$ 71.3	\$ 72.9	\$ 74.7	\$ 76.2	\$ 77.7	\$ 79.1	\$ 80.6	\$ 745.8
DDOT Payroll	\$ 30.1	\$ 33.9	\$ 34.4	\$ 35.3	\$ 36.1	\$ 37.1	\$ 37.8	\$ 38.5	\$ 39.3	\$ 40.1	\$ 362.6
Total Non Uniform Payroll	\$ 99.9	\$ 105.8	\$ 105.9	\$ 106.6	\$ 109.1	\$ 111.8	\$ 114.0	\$ 116.2	\$ 118.4	\$ 120.7	\$ 1,108.4
OPEB Contribution	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%	2.0%
Non Public Safety OPEB	\$2.0	\$2.1	\$2.1	\$2.1	\$2.2	\$2.2	\$2.3	\$2.3	\$2.4	\$2.4	\$22.2
PFRS (Includes DPLSA)	\$ 205.4	\$ 222.1	\$ 228.8	\$ 235.2	\$ 241.1	\$ 247.1	\$ 252.1	\$ 257.1	\$ 262.3	\$ 267.5	\$ 2,418.7
PFRS Contribution	0.5%	0.5%	0.4%	0.4%	0.4%	0.4%	0.4%	0.4%	0.4%	0.4%	0.4%
PFRS OPEB	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 10.0
OPEB Payments	\$ 3.0	\$ 3.1	\$ 3.1	\$ 3.1	\$ 3.2	\$ 3.2	\$ 3.3	\$ 3.3	\$ 3.4	\$ 3.4	\$ 32.2

Professional and Contractual Services

Professional and Contractual Services are comprised of the following categories: Auditing, Medical, Legal, Personal Service Contracts and Other Contracts. Professional and Contractual Services are expected to account for 7% of total costs over for the 10 Yr forecast. The City assumes all Professional and Contractual Services expenses will increase by 1% a year, with a few exceptions:

- Medical costs decrease from \$22.7 million in FY2013 to \$1.3 million in FY2014 due to the transition of the Health and Wellness department
- Personal Service Contracts are affected by a \$2 million increase in FY2014 related to City Council's outsourcing of its support staff
- Personal Service Contracts in the Mayor's department increase from \$8,000 in FY2013 to \$500,000 in FY2014 and to \$1 million in FY2015 before decreasing to \$29,000 in FY2018.
- Personal Service Contracts increase in the Public Lighting department as a number of jobs are outsourced beginning in FY2014. Those outsourced jobs are eliminated by FY2021.

- Other Contracts fluctuates due to additional resources needed in the election department during election years, resulting in an additional \$3 million expense.

Below is a breakdown including year over changes by line item:

Professional & Contracts	Preliminary Forecast										10 Year Total
	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	
Auditing	\$ 2.2	\$ 2.2	\$ 2.2	\$ 2.2	\$ 2.3	\$ 2.3	\$ 2.3	\$ 2.3	\$ 2.3	\$ 2.4	\$ 22.7
YoY Change	-11.8%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	-0.3%
Medical	\$ 1.3	\$ 1.4	\$ 1.4	\$ 1.4	\$ 1.4	\$ 1.4	\$ 1.4	\$ 1.4	\$ 1.5	\$ 1.5	\$ 14.1
YoY Change	-94.1%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	-8.5%
Legal	\$ 2.4	\$ 2.5	\$ 2.5	\$ 2.5	\$ 2.6	\$ 2.6	\$ 2.6	\$ 2.6	\$ 2.6	\$ 2.7	\$ 25.7
YoY Change	0.0%	1.6%	1.4%	1.2%	0.7%	0.6%	0.7%	0.7%	0.9%	1.0%	0.9%
Personal Services Contracts	\$ 10.5	\$ 22.5	\$ 18.7	\$ 15.2	\$ 12.3	\$ 11.4	\$ 10.1	\$ 8.7	\$ 8.0	\$ 8.1	\$ 125.4
YoY Change	98.0%	114.4%	-17.0%	-18.5%	-19.2%	-7.3%	-11.2%	-13.5%	-8.9%	1.0%	11.8%
Other Contracts	\$ 37.1	\$ 35.1	\$ 35.4	\$ 35.7	\$ 39.3	\$ 36.4	\$ 36.7	\$ 37.0	\$ 40.7	\$ 37.7	\$ 371.0
YoY Change	-14.5%	-5.5%	0.9%	0.9%	10.2%	-7.6%	0.9%	0.9%	9.8%	-7.3%	-1.1%
Total Professionals & Contracts	\$ 53.5	\$ 63.6	\$ 60.1	\$ 57.1	\$ 57.8	\$ 54.0	\$ 53.1	\$ 52.2	\$ 55.1	\$ 52.3	\$ 558.9
	-29.8%	18.7%	-5.4%	-5.1%	1.3%	-6.6%	-1.6%	-1.8%	5.6%	-5.1%	-3.0%

Risk Management & Insurance

Risk Management and Insurance is comprised of the following categories: Litigation, Workers Comp, Other Claims and Insurance. Risk Management and Insurance is expected to account for 5.6% of total costs over the 10 Yr Plan. The global assumption is Risk Management and Insurance will increase by 1% per year except for the following assumption:

- Litigation costs increase to FY2013 levels in FY2015 as the City exits bankruptcy in FY2015.

Below is a breakdown including year over changes by line item:

Preliminary Forecast											
RM and Insurance	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
Litigation	\$ 18.8	\$ 26.6	\$ 26.8	\$ 27.1	\$ 27.4	\$ 27.6	\$ 27.9	\$ 28.2	\$ 28.5	\$ 28.8	\$ 267.6
YoY Change	-28.5%	41.3%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	2.1%
Workers Comp	\$ 4.8	\$ 4.9	\$ 4.9	\$ 4.9	\$ 5.0	\$ 5.0	\$ 5.1	\$ 5.1	\$ 5.2	\$ 5.3	\$ 50.2
YoY Change	0.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	0.9%
Other Claims	\$ 11.6	\$ 11.7	\$ 11.8	\$ 11.9	\$ 12.0	\$ 12.1	\$ 12.3	\$ 12.4	\$ 12.5	\$ 12.6	\$ 120.9
YoY Change	0.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	0.9%
Insurance	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.7	\$ 0.7	\$ 6.3
YoY Change	-24.4%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	-2.4%
Total RM and Insurance	\$ 35.2	\$ 43.1	\$ 43.5	\$ 43.9	\$ 44.4	\$ 44.8	\$ 45.3	\$ 45.7	\$ 46.2	\$ 46.7	\$ 438.8
YoY Change	-17.6%	22.5%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.3%

Materials and Supplies

Materials and Supplies are comprised of the following categories: Operating Supplies, Fuel and Lubricants, Repairs and Maintenance and Other. Materials and Supplies are expected to account for 4.7% of total costs over the ten year period. The global assumption is all materials and supplies expenses will increase by 1% per year.

- Operating Supplies decrease from FY2016-2021 due to the transition of the Public Lighting department.
- Fuel and Lubricants decrease in FY2015 due to the transition of the Public Lighting department.
- Repairs and Maintenance decrease in FY2017 due to \$1.9 million in savings in the ITS department as a result of the new payroll system.

Below is a breakdown including year over changes by line item:

Preliminary Forecast											
Materials & Supplies	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
Operating supplies	\$ 5.1	\$ 5.6	\$ 5.9	\$ 5.6	\$ 5.3	\$ 4.9	\$ 4.6	\$ 4.2	\$ 4.1	\$ 4.2	\$ 49.4
<i>YoY Change</i>	18.4%	9.1%	6.2%	-5.1%	-4.8%	-8.3%	-6.7%	-7.6%	-2.1%	1.0%	0.0%
Fuel & Lubricants	\$ 45.5	\$ 15.7	\$ 15.8	\$ 16.0	\$ 16.1	\$ 16.3	\$ 16.5	\$ 16.6	\$ 16.8	\$ 17.0	\$ 192.2
<i>YoY Change</i>	0.8%	-65.6%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	-5.7%
Repairs & Maint	\$ 11.9	\$ 11.0	\$ 11.4	\$ 9.8	\$ 9.6	\$ 9.3	\$ 9.1	\$ 8.8	\$ 8.8	\$ 8.9	\$ 98.5
<i>YoY Change</i>	16.3%	-7.5%	4.1%	-14.3%	-1.8%	-3.4%	-2.4%	-2.7%	-0.3%	1.0%	-1.1%
Other - MS	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 35.8
<i>YoY Change</i>	-0.3%	0.9%	0.6%	0.3%	-0.4%	-0.6%	-0.4%	-0.5%	-0.2%	0.0%	-0.1%
Total Materials & Supplies	\$ 66.0	\$ 35.8	\$ 36.7	\$ 35.0	\$ 34.7	\$ 34.0	\$ 33.6	\$ 33.2	\$ 33.3	\$ 33.5	\$ 375.9
<i>YoY Change</i>	4.5%	-45.8%	2.7%	-4.8%	-0.8%	-1.8%	-1.2%	-1.3%	0.1%	0.9%	-4.8%

Utilities

Utilities are expected to account for 3.7% of total costs over the 10 Yr forecast.

All Utilities are expected to increase by 1% per year except for the following:

- Water is projected to increase year over year by the following:

<u>Year</u>	<u>YoY Change</u>
2015	1.5%
2016	5.7%
2017	5.7%
2018	2.8%
2019	3.5%
2020	3.5%
2021	3.5%
2022	3.9%
2023	3.9%

- Sewage is projected to increase year over year by the following:

Year	YoY Change
2015	1.4%
2016	3.7%
2017	2.9%
2018	3.1%
2019	3.7%
2020	3.6%
2021	3.7%
2022	4.0%
2023	4.0%

- Outside purchases for electricity is expected to increase 25% in FY2015 as the City transitions to purchasing electricity from an outside vendor.

Preliminary Forecast											
Utilities	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
Telecommunications	\$ 9.3	\$ 9.4	\$ 9.5	\$ 9.6	\$ 9.6	\$ 9.7	\$ 9.8	\$ 9.9	\$ 10.0	\$ 10.1	\$ 97.0
YoY Change	134.9%	1.0%	0.9%	0.9%	0.9%	0.9%	0.9%	0.9%	1.0%	1.0%	14.3%
Water	\$ 1.3	\$ 1.3	\$ 1.4	\$ 1.4	\$ 1.5	\$ 1.5	\$ 1.5	\$ 1.5	\$ 1.6	\$ 1.6	\$ 14.7
YoY Change	12.2%	0.7%	3.5%	3.7%	1.1%	1.8%	1.9%	1.8%	3.0%	3.9%	3.4%
Natural Gas	\$ 2.3	\$ 1.9	\$ 1.9	\$ 1.8	\$ 1.8	\$ 1.8	\$ 1.8	\$ 1.8	\$ 1.9	\$ 1.9	\$ 18.9
YoY Change	-0.4%	-16.4%	-1.5%	-7.1%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	-1.9%
Steam	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.8	\$ 0.8	\$ 0.8	\$ 0.8	\$ 0.8	\$ 0.8	\$ 7.6
YoY Change	15.3%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	2.4%
Electricity	\$ 4.3	\$ 6.4	\$ 4.3	\$ 3.9	\$ 3.9	\$ 3.8	\$ 3.8	\$ 3.8	\$ 3.9	\$ 3.9	\$ 42.1
YoY Change	1.1%	47.7%	-33.4%	-8.1%	-1.3%	-1.3%	-0.4%	0.6%	0.8%	1.0%	0.7%
Sewage	\$ 7.2	\$ 7.2	\$ 7.2	\$ 7.2	\$ 7.3	\$ 7.3	\$ 7.4	\$ 7.5	\$ 7.7	\$ 8.0	\$ 74.0
YoY Change	30.7%	0.2%	0.8%	0.2%	0.4%	1.0%	1.0%	1.0%	2.5%	4.0%	4.2%
Utilities IPO	\$ 3.3	\$ 4.1	\$ 4.1	\$ 4.1	\$ 4.2	\$ 4.2	\$ 4.3	\$ 4.3	\$ 4.4	\$ 4.4	\$ 41.4
YoY Change	-4.8%	21.5%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	2.5%
Other - Utl	\$ 0.0	\$ 0.0	\$ 0.0	\$ 0.0	\$ 0.0	\$ 0.0	\$ 0.0	\$ 0.0	\$ 0.0	\$ 0.0	\$ 0.0
YoY Change	-2.2%	-7.2%	-5.3%	-18.8%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	-3.3%
Total Utilities	\$ 28.5	\$ 31.0	\$ 29.1	\$ 28.8	\$ 29.0	\$ 29.2	\$ 29.4	\$ 29.7	\$ 30.2	\$ 30.7	\$ 295.7
YoY Change	33.3%	8.9%	-6.2%	-1.0%	0.5%	0.7%	0.9%	1.0%	1.4%	1.9%	4.1%

Purchased Services

Purchased Services are expected to account for 2.9% of total costs over the ten year period. All Purchased Services are expected to increase by 1% per year except for the following:

- 17% increase in FY2016 driven by the implementation of the payroll service.

Preliminary Forecast											
	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
Purchased Services	\$ 18.4	\$ 19.3	\$ 22.6	\$ 24.8	\$ 24.6	\$ 24.3	\$ 24.2	\$ 24.0	\$ 24.0	\$ 24.2	\$ 230.4
YoY Change	234.8%	4.9%	17.5%	9.4%	-0.5%	-1.2%	-0.7%	-0.8%	0.2%	0.8%	26.4%

Other Expenses and Capital Outlays

Other Expenses and Capital Outlays are expected to account for 5.3% of total costs over the 10 Yr projections. The majority of expenses are expected to increase approximately 1%. The chart below highlights all other operating expenses in the General Fund:

Preliminary Forecast												
Other Expenses	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total	
Printing	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 7.1	
YoY Change	46.6%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	5.6%	
Rental	\$ 11.8	\$ 12.6	\$ 12.7	\$ 12.7	\$ 12.7	\$ 12.6	\$ 12.6	\$ 12.6	\$ 12.6	\$ 12.6	\$ 125.5	
YoY Change	25.7%	7.0%	0.1%	0.1%	-0.1%	-0.1%	-0.1%	-0.1%	0.0%	0.0%	3.2%	
Employee Parking	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 4.3	
YoY Change	-20.9%	2.3%	1.9%	1.5%	0.4%	0.1%	0.3%	0.3%	0.3%	0.8%	-1.2%	
Private Car Reimbursement	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 2.5	
YoY Change	-5.8%	1.2%	1.1%	1.1%	0.9%	0.9%	0.9%	0.9%	1.0%	1.0%	0.3%	
Travel	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 1.6	
YoY Change	-1.1%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	0.8%	
Training	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 6.2	
YoY Change	182.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	19.1%	
Other Operating Costs	\$ 11.0	\$ 15.0	\$ 11.5	\$ 10.9	\$ 10.2	\$ 10.2	\$ 10.3	\$ 10.3	\$ 10.3	\$ 10.4	\$ 110.1	
YoY Change	5.9%	36.0%	-22.8%	-5.6%	-6.3%	0.2%	0.3%	0.2%	0.4%	0.5%	0.9%	
Development Costs	\$ 2.8	\$ 2.9	\$ 2.9	\$ 2.9	\$ 3.0	\$ 3.0	\$ 3.0	\$ 3.1	\$ 3.1	\$ 3.1	\$ 29.8	
YoY Change	-6.4%	1.3%	1.2%	1.1%	0.9%	0.8%	0.9%	0.9%	1.0%	1.0%	0.3%	
Total Improvement Fund	\$ 7.2	\$ 7.2	\$ 7.2	\$ 7.2	\$ 7.2	\$ 7.2	\$ 7.2	\$ 7.2	\$ 7.2	\$ 7.2	\$ 71.6	
YoY Change	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	
Capital Outlays	\$ 5.9	\$ 6.0	\$ 6.1	\$ 6.1	\$ 6.2	\$ 6.2	\$ 6.3	\$ 6.4	\$ 6.4	\$ 6.5	\$ 62.0	
YoY Change	-57.6%	1.0%	1.0%	0.9%	1.0%	1.0%	1.0%	1.0%	1.0%	1.0%	-4.9%	
Total Other and Capital Outlays	\$ 40.8	\$ 45.7	\$ 42.5	\$ 41.9	\$ 41.3	\$ 41.4	\$ 41.6	\$ 41.7	\$ 41.8	\$ 42.0	\$ 420.7	
YoY Change	-10.4%	12.01%	-7.19%	-1.25%	-1.42%	0.25%	0.29%	0.29%	0.37%	0.41%	-0.7%	

Section H – RRIs and Non-Operating Expenditures

Summary³¹

The City identified restructuring and reinvestment initiatives by department that are essential to the revitalization of Detroit and the provision of essential municipal services. The City has identified \$1.7 billion of reinvestment initiatives to be undertaken during the next ten years, provided funding is available to do so. This section focuses on the underlying assumptions in the RRIs and certain other non-operating expenditures that are reflected in the POA projections. The total RRIs and non-operating expenditures are summarized below:

³¹ Unless otherwise stated the financial projections referenced in section H are sourced from bibliography: Conway Mackenzie Models: 28-54 and Ernst & Young Models 10-11.

General Fund	FY2014-2023	FY2014-2023	FY2014-2023	FY2014-2023
Operating Surplus Prior to Legacy, Non Operating Expenses and RRI's	\$ 2,781	\$ 2,054	\$ 1,788	\$ 1,434
<u>Reinvestment Initiatives</u>				
Department revenue initiatives	\$ 483	\$ 586	\$ 715	\$ 871
Less:				
Additional operating expenditures	\$ 357	\$ 359	\$ 438	\$ 534
Capital investments	\$ 582	\$ 443	\$ 501	\$ 605
Blight	\$ 420	\$ -	\$ -	\$ -
Reinvestment Deferrals	\$ (30)	\$ (223)	\$ 11	\$ 242
Total Reinvestment Expenditures	\$ 1,330	\$ 579	\$ 950	\$ 1,381
<u>Other Non Operating Expenses</u>				
Less:				
PLD Decommission	\$ 75	\$ -	\$ -	\$ -
Contributions to Income Stabilization Fund	\$ 18	\$ 2	\$ -	\$ -
Professional Fees	\$ 130	\$ -	\$ -	\$ -
Working Capital	\$ 25	\$ -	\$ -	\$ -
Secured Debt	\$ 391	\$ 391	\$ 67	\$ -
Swap Interest	\$ 104	\$ -	\$ -	\$ -
QOL Exit Financing	\$ 336	\$ 110	\$ -	\$ -
Contingency	\$ 101	\$ 121	\$ 144	\$ 173
Total Non Operating Expenses	\$ 1,179	\$ 624	\$ 211	\$ 173
Funds Available for Unsecured Claims	\$ 755	\$ 1,437	\$ 1,342	\$ 752

The RRIs were developed by department by CM, and identify capital investments, additional labor and other operating expenses that are needed to ensure that each City department is providing a basic level of service for Detroit residents. In addition, the City identified revenue enhancing initiatives as part of its departmental reviews. The chart below highlights the RRIs by category:

Revenue	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
Pricing/Fees	\$ 0.4	\$ 10.0	\$ 15.5	\$ 16.8	\$ 21.5	\$ 23.2	\$ 27.3	\$ 26.8	\$ 30.9	\$ 31.8	\$ 204.1
Faster Collections	\$ 2.2	\$ 12.6	\$ 15.0	\$ 18.3	\$ 18.6	\$ 18.9	\$ 19.2	\$ 19.4	\$ 19.8	\$ 20.1	\$ 164.3
Grant Revenue	\$ 3.1	\$ 40.6	\$ 9.0	\$ 12.2	\$ 12.9	\$ 0.5	\$ 0.5	\$ 0.6	\$ 0.6	\$ 0.6	\$ 80.6
Other	\$ (0.1)	\$ 19.9	\$ (0.2)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ -	\$ (0.1)	\$ -	\$ 19.3
Past Due Collections	\$ 1.5	\$ 4.9	\$ 5.7	\$ 2.5	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 14.7
Total Revenue	\$ 7.2	\$ 88.0	\$ 45.1	\$ 49.7	\$ 52.9	\$ 42.5	\$ 46.9	\$ 46.8	\$ 51.3	\$ 52.5	\$ 482.9

Operating Expenditures	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
Permanent Labor	\$ 2.7	\$ 24.2	\$ 20.1	\$ 22.2	\$ 21.7	\$ 19.8	\$ 19.7	\$ 19.0	\$ 18.6	\$ 17.7	\$ 185.6
Professional & Contract Services	\$ 0.4	\$ (1.0)	\$ (1.3)	\$ (1.3)	\$ (1.2)	\$ (1.2)	\$ (1.1)	\$ (1.1)	\$ (1.1)	\$ (1.0)	\$ (10.0)
Active Benefits	\$ 1.3	\$ 10.2	\$ 10.2	\$ 12.7	\$ 12.6	\$ 11.8	\$ 11.9	\$ 11.6	\$ 11.5	\$ 11.3	\$ 105.1
Training	\$ 0.3	\$ 7.3	\$ 9.2	\$ 6.3	\$ 5.4	\$ 5.2	\$ 5.1	\$ 5.2	\$ 5.3	\$ 5.0	\$ 54.4
Materials and Supplies	\$ 2.0	\$ 6.6	\$ 11.5	\$ 10.2	\$ 8.3	\$ 8.8	\$ 9.4	\$ 9.6	\$ 10.1	\$ 10.6	\$ 87.1
Utilities	\$ 0.2	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 2.6
Purchased services	\$ 0.4	\$ 0.8	\$ (0.8)	\$ (0.5)	\$ (1.0)	\$ (0.5)	\$ (1.0)	\$ (0.5)	\$ (0.9)	\$ (0.4)	\$ (4.5)
Risk management/insurance	\$ (0.0)	\$ (2.1)	\$ (6.1)	\$ (6.1)	\$ (6.1)	\$ (6.1)	\$ (6.1)	\$ (6.1)	\$ (6.1)	\$ (6.1)	\$ (50.7)
Transfers In/(Out) (General Fund)	\$ (0.4)	\$ 4.4	\$ 0.5	\$ (2.3)	\$ (2.7)	\$ (3.5)	\$ (3.5)	\$ (3.1)	\$ (3.6)	\$ (3.6)	\$ (17.7)
Grant related expenses	\$ 1.2	\$ 15.6	\$ 3.5	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 20.3
All Other	\$ (0.1)	\$ (1.7)	\$ (1.7)	\$ (1.6)	\$ (1.6)	\$ (1.6)	\$ (1.5)	\$ (1.6)	\$ (1.6)	\$ (1.6)	\$ (14.8)
Total Operating Expenditures	\$ 8.0	\$ 64.6	\$ 45.3	\$ 39.9	\$ 35.6	\$ 33.0	\$ 33.0	\$ 33.3	\$ 32.5	\$ 32.1	\$ 357.4

Reorganization/Investment	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
Technology Infrastructure	\$ 3.1	\$ 41.3	\$ 34.4	\$ 19.6	\$ 10.1	\$ 7.4	\$ 10.7	\$ 8.8	\$ 8.8	\$ 7.5	\$ 151.7
Capital Expenditures	\$ 5.9	\$ 33.5	\$ 41.7	\$ 26.1	\$ 22.4	\$ 19.5	\$ 22.7	\$ 20.0	\$ 16.7	\$ 16.8	\$ 225.4
Other Infrastructure	\$ 8.3	\$ 25.8	\$ 24.0	\$ 19.1	\$ 16.4	\$ 15.7	\$ 15.8	\$ 15.2	\$ 13.7	\$ 13.4	\$ 167.4
Reorganization Costs	\$ 3.2	\$ 18.2	\$ 6.3	\$ 0.9	\$ 1.2	\$ 1.0	\$ 2.7	\$ 2.0	\$ 1.2	\$ 1.0	\$ 37.7
Total Reorganization/Investment	\$ 20.6	\$ 118.9	\$ 106.4	\$ 65.6	\$ 50.2	\$ 43.6	\$ 51.9	\$ 46.0	\$ 40.4	\$ 38.6	\$ 582.2

Revenue Initiatives

The City identified \$483 million in additional revenue over the 10 year period that could be available to the City if it implements the RRI's effectively. The largest sources of additional revenue include: increasing service and fares for DDOT, increasing the volume and dollar amount of parking tickets and collecting income taxes and various civil fines at a faster rate. The revenue initiatives also include \$52 million from the Hardest Hit Fund and other grants that the City has identified that were not in the baseline 10 Yr projections. The chart below highlights the revenue initiatives:

Revenue Initiative	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
DDOT Expansion	\$ 0.4	\$ 1.5	\$ 5.7	\$ 7.1	\$ 11.7	\$ 13.4	\$ 17.5	\$ 17.1	\$ 21.2	\$ 22.0	\$ 117.6
Faster 36DC Collections	\$ -	\$ 3.9	\$ 5.5	\$ 8.5	\$ 8.7	\$ 9.0	\$ 9.2	\$ 9.5	\$ 9.8	\$ 10.1	\$ 74.1
Increased Parking Tickets	\$ -	\$ 5.6	\$ 6.8	\$ 6.8	\$ 6.8	\$ 6.8	\$ 6.8	\$ 6.8	\$ 6.8	\$ 6.8	\$ 60.3
Income Tax Collection Improvements	\$ 1.2	\$ 4.9	\$ 4.9	\$ 5.2	\$ 5.2	\$ 5.2	\$ 5.2	\$ 5.2	\$ 5.2	\$ 5.2	\$ 47.4
Increased Collections for New Fire Department Hires	\$ 0.9	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.6	\$ 3.7	\$ 3.7	\$ 33.7
New Billings for Services	\$ -	\$ 2.9	\$ 2.9	\$ 2.9	\$ 2.9	\$ 2.9	\$ 2.9	\$ 2.9	\$ 2.9	\$ 2.9	\$ 26.2
All Other	\$ 4.7	\$ 65.6	\$ 15.6	\$ 15.6	\$ 13.9	\$ 1.5	\$ 1.6	\$ 1.6	\$ 1.7	\$ 1.8	\$ 123.6
Total Revenue Initiatives	\$ 7.2	\$ 88.0	\$ 45.1	\$ 49.7	\$ 52.9	\$ 42.5	\$ 46.9	\$ 46.8	\$ 51.3	\$ 52.5	\$ 482.9

DDOT is expecting to increase the number of buses in service from 282 in FY2013 to 394 in FY2023. In addition, the City is projecting total miles to increase from 12.1 million miles in FY2013 to 16.5 million miles in FY2023. The increase in mileage is expected to increase revenue by \$47 million over the ten year period and is dependent on obtaining new buses, which are grant funded, and increasing the number of routes.

The City is also projecting increased revenue as a result of fare price increases. The City has not had a fare price increase in the last 8 years. The following table shows the projected fare increases for DDOT:

Year	Fare Price	YoY Change
2013	\$ 1.50	0.0%
2014	\$ 1.50	0.0%
2015	\$ 1.50	0.0%
2016	\$ 1.75	16.7%
2017	\$ 1.75	0.0%
2018	\$ 2.00	14.3%
2019	\$ 2.00	0.0%
2020	\$ 2.25	12.5%
2021	\$ 2.25	0.0%
2022	\$ 2.50	11.1%
2023	\$ 2.50	0.0%

The City took into account decreased ridership at each fare price increase, assuming ridership would decrease 2% for every 10% increase in fares. The

increased revenue associated with the fare increases, minus the reduced ridership, results in a total revenue increase over the ten year period of \$70 million.

The City is projecting it will be able to collect an additional \$74 million as a result of better collections of civil fines and infractions. The City currently collects infractions at a 36% rate. The City is projecting it will increase collections from 36% in 2013 to 56.8% in 2023 leading to the additional \$74 million in revenue over the ten year period. The City believes this collection rate is achievable as the regional average is currently 65% which includes Detroit's low collection rate. The City has identified a few initiatives that will help improve collections including increased access to ATM's at the Court and improved operating systems and business processes.

The Emergency Manager implemented increases to parking ticket fines on April 3, 2014³². The City has long lagged comparable municipalities in this regard³³. The recent increase in the parking fines, in addition to additional parking officers, is expected to increase revenue by \$60 million over the ten year period.

The Finance department has identified a number of initiatives to improve the collection of income taxes. These include additional staffing, targeting non-

³² See Emergency Manager City of Detroit Order Number 24

³³ See PVB Revenue Enhancement White Paper dated December 9, 2013.

residents working in Detroit and using outside services. The initiatives are expected to generate an additional \$47 million over the ten year period.

The Fire department is expecting to collect additional revenue as a result of 9 new ambulances, additional Fire Marshalls and cross training fire fighters to do Fire Marshall and EMS work. The initiatives are expected to generate \$34 million in revenue over the ten years. The Fire department, along with the Police department, expects to increase revenues by billing services that have not been billed in the past. These new billings represent \$26 million in additional revenue over the ten year period.

Operating Expenditures

The City is projecting it will incur an additional \$357 million in operating expenditures in the next 10 years related to the RRI's. This does not include \$420 million estimated for Blight over the next ten years. Blight is discussed separately in section L of this Report.

Labor

The largest component of additional operating expense over the ten year period is permanent labor which totals \$186 million and represents 52% of the additional operating expenditures. Below is a summary of the labor increase:

Labor	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
New Labor due to Incremental Headcount	\$ 5.5	\$ 27.6	\$ 31.7	\$ 35.6	\$ 34.4	\$ 32.2	\$ 32.2	\$ 31.1	\$ 31.2	\$ 30.7	\$ 292.2
Overtime for New Employees	\$ -	\$ 0.0	\$ 0.2	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.4	\$ -	\$ 2.0
Overtime Savings from New Employees	\$ -	\$ 0.7	\$ (2.5)	\$ (6.9)	\$ (7.0)	\$ (7.1)	\$ (7.3)	\$ (7.4)	\$ (7.5)	\$ (7.7)	\$ (52.7)
Efficiency Savings	\$ -	\$ (0.0)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.4)	\$ (1.3)	\$ (1.4)	\$ (1.8)	\$ (2.0)	\$ (7.5)
Add Back Overestimate Police and Fire Wages	\$ (2.9)	\$ (4.1)	\$ (9.1)	\$ (6.5)	\$ (5.8)	\$ (5.1)	\$ (4.2)	\$ (3.6)	\$ (3.6)	\$ (3.6)	\$ (48.5)
Total Labor Expense	\$ 2.7	\$ 24.2	\$ 20.2	\$ 22.3	\$ 21.7	\$ 19.8	\$ 19.7	\$ 19.0	\$ 18.6	\$ 17.3	\$ 185.6

Additional headcount by department projections can be seen below:

Department	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
DDOT - Transportation	-	-	50	113	131	133	134	138	149	163
Police	125	250	250	210	175	162	149	149	149	149
Fire	161	97	84	182	193	165	153	135	129	117
Finance/Budget	28	120	121	121	112	112	112	112	112	112
General Services	112	112	112	112	112	112	112	112	112	112
Mayor's Office	31	31	31	31	31	31	31	31	31	31
Human Resources	4	19	22	22	22	22	22	22	22	22
Ombudsperson	-	-	20	20	20	20	20	20	20	20
Law	-	9	17	17	17	17	17	17	17	17
Labor Relations	-	3	11	11	11	11	11	11	11	11
Human Rights / Board of Ethics	-	6	6	6	6	6	6	6	6	6
Auditor General / Inspector General	-	4	4	4	4	4	4	4	4	4
Airport	-	1	1	1	1	1	1	1	1	1
Buildings and Safety	2	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)
City Clerk	-	(3)	(3)	(3)	(3)	(3)	(3)	(3)	(3)	(3)
Municipal Parking	1	7	(6)	(6)	(6)	(6)	(6)	(6)	(6)	(6)
Non-Departmental (36D Initiatives)	-	(15)	(25)	(25)	(25)	(25)	(25)	(25)	(25)	(25)
Planning & Development	16	(32)	(34)	(34)	(34)	(34)	(34)	(34)	(34)	(34)
Total	480	609	660	781	766	727	704	690	694	696

The total consolidated number of employees³⁴ for all departments by year including the base 10 Yr Plan and RRI is highlighted below:

Total Employees	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2008-2012 Average	Variance
Total Employees Reinvestment		480	609	660	781	766	727	704	690	694	696		
Total Employees Base Model	10,043	9,578	9,634	9,770	9,747	9,745	9,745	9,745	9,744	9,742	9,742		
Total Employees	10,043	10,058	10,242	10,431	10,529	10,512	10,472	10,449	10,434	10,436	10,439	12,395	-15.8%

New Hires by Year	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Total
Incremental Employees - Reinvestment	480	129	52	121	(15)	(40)	(23)	(14)	4	2	696
Incremental Employees - Base Model	(465)	56	136	(23)	(2)	-	-	(1)	(2)	-	(301)
Total Additional Head Count	15	185	188	98	(17)	(40)	(23)	(15)	2	2	396

The chart below shows total employees by department from both the 10 Yr forecast and RRI in FY2023 General Fund departments:

³⁴ The FY2008-2012 average only includes departments that will still be operating in FY2023

2023 Employees by Department				2023 vs. 2008-2012 Avg.		
General Fund	Base	Reinvestment	Total	2008-2012 Avg	Var	% Variance
Police	2,895	149	3,044	3,322	(277)	-9.1%
Fire	1,228	117	1,345	1,358	(14)	-1.0%
36th District Court	362	(25)	337	301	36	10.5%
General Services	272	112	384	495	(111)	-28.9%
Waste/Public Works	284	-	284	416	(132)	-46.5%
Finance/Budget/ITS	260	112	372	373	(1)	-0.3%
Recreation	202	-	202	436	(233)	NM
Planning & Development	113	(34)	79	156	(77)	-98.3%
Law	86	17	103	112	(10)	-9.3%
Elections	60	-	60	72	(12)	-19.5%
Human Resources	60	33	93	159	(66)	-71.4%
Mayor	24	31	55	67	(12)	-22.0%
Non-Departmental	17	-	17	26	(9)	-54.6%
Auditor General	17	4	21	17	4	19.2%
City Clerk	15	(3)	12	22	(10)	-82.3%
Zoning	11	-	11	15	(3)	-30.9%
City Council	10	-	10	75	(65)	NM
Health & Wellness	9	-	9	271	(262)	NM
Ombudsperson	6	20	26	9	17	64.9%
Human Rights	5	6	11	10	2	14.4%
Administrative Hearings	4	-	4	6	(2)	-55.0%
Total General Funds	5,940	539	6,479	7,718	(1,239)	-19.1%

After accounting for the additional employees in the reinvestment initiatives, the City is still operating with 19% fewer employees than the 5 year average from FY2008-2012. The largest increases in employees occur in Transportation, Police, Fire, Finance and the General Services departments:

- The 163 additional employees at DDOT include 35 additional uniformed employees to increase safety on buses, and additional bus drivers for additional routes
- The Police department is estimating 250 additional civilian personnel in FY2015 which will allow the City to redeploy uniformed personnel to police activities
- The Fire department expects to hire new fire fighters to provide adequate levels of service to the City. These fire fighters will be cross trained to improve efficiency and reduce overtime in the department

- The Finance department expects to hire an additional 112 employees as it identifies ways to operate more efficiently, identify new grant revenue and collect taxes at a faster pace
- General Services expects to hire an additional 112 employees primarily related to facilities and park maintenance.

The City forecasts incremental labor costs by identifying the positions to be added or eliminated and estimating the salary for those positions. Going forward the City assumed the same year over year incremental salary increases per employee as were projected in the base model. Over the ten year period the City expects incremental salaries and wages to increase \$292 million due to the RRI's. The chart below summarizes incremental labor costs by department:

Incremental Salary & Wages	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
Finance/Budget	\$ 0.3	\$ 5.0	\$ 6.3	\$ 6.5	\$ 6.7	\$ 6.8	\$ 7.0	\$ 7.1	\$ 7.2	\$ 7.4	\$ 60.4
Police	\$ 1.5	\$ 8.8	\$ 9.4	\$ 7.4	\$ 5.6	\$ 5.0	\$ 4.5	\$ 4.6	\$ 4.7	\$ 4.8	\$ 56.2
Fire	\$ 1.7	\$ 5.6	\$ 4.0	\$ 8.0	\$ 7.8	\$ 5.6	\$ 5.6	\$ 3.9	\$ 3.3	\$ 2.0	\$ 47.4
General Services	\$ 0.7	\$ 2.3	\$ 4.4	\$ 4.5	\$ 4.7	\$ 4.8	\$ 4.9	\$ 5.0	\$ 5.1	\$ 5.2	\$ 41.6
DDOT - Transportation	\$ 0.1	\$ 1.9	\$ 2.2	\$ 3.3	\$ 3.7	\$ 3.8	\$ 3.9	\$ 4.1	\$ 4.4	\$ 4.7	\$ 32.1
Law	\$ -	\$ 0.7	\$ 1.5	\$ 1.5	\$ 1.5	\$ 1.6	\$ 1.6	\$ 1.6	\$ 1.7	\$ 1.7	\$ 13.4
Mayor's Office	\$ 0.8	\$ 1.3	\$ 1.3	\$ 1.3	\$ 1.4	\$ 1.4	\$ 1.4	\$ 1.4	\$ 1.5	\$ 1.5	\$ 13.3
Human Resources	\$ -	\$ 0.9	\$ 1.3	\$ 1.4	\$ 1.4	\$ 1.4	\$ 1.5	\$ 1.5	\$ 1.5	\$ 1.5	\$ 12.4
Planning & Development	\$ 0.3	\$ 0.9	\$ 0.8	\$ 0.9	\$ 0.9	\$ 0.9	\$ 0.9	\$ 0.9	\$ 1.0	\$ 1.0	\$ 8.5
Ombudsperson	\$ -	\$ -	\$ 0.4	\$ 0.6	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 5.2
Labor Relations	\$ -	\$ 0.1	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.5	\$ 0.5	\$ 0.5	\$ 0.5	\$ 3.7
Human Rights / Board of Ethics	\$ -	\$ 0.2	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 3.1
Auditor General / Inspector General	\$ -	\$ 0.2	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 2.5
Airport	\$ -	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 1.6
Municipal Parking	\$ 0.0	\$ 0.2	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.2)
Buildings and Safety	\$ 0.0	\$ 0.0	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.3)
Elections	\$ -	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.4)
City Clerk	\$ -	\$ (0.2)	\$ (0.2)	\$ (0.2)	\$ (0.2)	\$ (0.2)	\$ (0.2)	\$ (0.2)	\$ (0.2)	\$ (0.2)	\$ (1.5)
Non-Departmental (36D Initiatives)	\$ -	\$ (0.3)	\$ (0.7)	\$ (0.8)	\$ (0.8)	\$ (0.8)	\$ (0.8)	\$ (0.8)	\$ (0.8)	\$ (0.9)	\$ (6.7)
Total Incremental Salary and Wages	\$ 5.5	\$ 27.6	\$ 31.7	\$ 35.6	\$ 34.4	\$ 32.2	\$ 32.2	\$ 31.1	\$ 31.2	\$ 30.7	\$ 292.2

In the base model, the City assumes that overtime remains at the FY 2013 level as a percentage of payroll. The City assumes that the incremental employees

hired as a result of the RRI's do not increase or decrease the overtime assumed in the base model with the following exceptions:

- Fire department overtime decreases by \$2 million over the ten year period and further savings of \$6.3 million occur due to reaching adequate staffing levels
- DDOT assumes \$48.7 million in overtime savings over the 10 year period as new buses are added to the fleet, maintenance on old buses decreases, overtime is reduced considerably. In addition, new safety cameras and additional police staff should increase driver and rider safety, thereby decreasing driver absenteeism and resulting in decreased overtime

The decrease in overtime at DDOT is a key assumption over the next ten years as the City provides a subsidy to DDOT. The analysis below highlights the projected overtime in gross dollars and as a percentage of payroll for both the base model and the added employees and the decreased overtime from the RRI's:

DDOT Consolidated Payroll and Overtime	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Total
Total Payroll Base Model	\$ 30.1	\$ 33.9	\$ 34.4	\$ 35.3	\$ 36.1	\$ 37.1	\$ 37.8	\$ 38.5	\$ 39.3	\$ 40.1	\$ 362.6
Total Overtime Base Model	\$ 12.0	\$ 13.5	\$ 13.8	\$ 14.1	\$ 14.5	\$ 14.8	\$ 15.1	\$ 15.4	\$ 15.7	\$ 16.0	\$ 145.0
As a % of Payroll	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%	40.0%
New Payroll	\$ 0.1	\$ 1.9	\$ 2.2	\$ 3.3	\$ 3.7	\$ 3.8	\$ 3.9	\$ 4.1	\$ 4.4	\$ 4.7	\$ 32.1
Overtime Savings	\$ -	\$ (1.0)	\$ (5.6)	\$ (5.6)	\$ (5.7)	\$ (5.8)	\$ (6.0)	\$ (6.1)	\$ (6.1)	\$ (6.7)	\$ (48.7)
Consolidated DDOT Payroll	\$ 30.2	\$ 35.7	\$ 36.6	\$ 38.6	\$ 39.8	\$ 40.9	\$ 41.7	\$ 42.6	\$ 43.7	\$ 44.8	\$ 394.7
Consolidated Overtime	\$ 12.0	\$ 12.6	\$ 8.2	\$ 8.5	\$ 8.7	\$ 9.0	\$ 9.1	\$ 9.3	\$ 9.6	\$ 9.3	\$ 96.3
As a % of Payroll	39.8%	35.2%	22.3%	21.9%	21.9%	22.0%	21.8%	21.9%	22.0%	20.8%	24.4%

The City is expecting overtime for DDOT to decrease from its baseline estimate of 40% to 20.8% by FY2023. If the City is unsuccessful in decreasing overtime and overtime remains at 40% of payroll, the subsidy would be \$61 million higher than currently projected over the ten years.

Prior to the July 2nd projections, the City reexamined the projections for salaries and wages for new hires in the Police and Fire departments in the baseline 10 Yr projections. In the May 5th projections the City assumed all new hires would be at the average salary of the department. In reality, the new entry level employees hired will likely be at a much lower pay scale. Recalculating the actual salaries for these new employees in the baseline model results in \$48.5 million³⁵ in total savings for the ten year period:

Recalc of Police and Fire Base Model Hires	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
Police	\$ -	\$ (1.1)	\$ (6.1)	\$ (3.5)	\$ (2.7)	\$ (1.9)	\$ (0.9)	\$ (0.2)	\$ (0.2)	\$ (0.2)	\$ (16.7)
Fire	\$ (2.9)	\$ (3.0)	\$ (3.0)	\$ (3.1)	\$ (3.1)	\$ (3.2)	\$ (3.3)	\$ (3.4)	\$ (3.4)	\$ (3.5)	\$ (31.8)
Total Add Backs for Pay Difference	\$ (2.9)	\$ (4.1)	\$ (9.1)	\$ (6.5)	\$ (5.8)	\$ (5.1)	\$ (4.2)	\$ (3.6)	\$ (3.6)	\$ (3.6)	\$ (48.5)

Professionals and Contractual Services

The City is projecting a \$10 million decrease in professional and contractual services over the 10 Yr projections. The savings are primarily related to the Income Tax department implementing CityTax and the need for less outside employment.

³⁵ The reduced costs associated with the changes in assumptions for the Police and Fire departments in this section do not include additional add backs for benefits which are \$5.8 million and \$13.3 million for the Police and Fire departments, respectively, and are included in the benefits section. Total reduced costs for the recalculation including salary, overtime and benefits is \$67.7 million for the two departments.

Benefits

The City estimated benefits using the following percentage of payroll projections:

Incremental Benefits as a % of Payroll	% of Payroll
Police	40.5%
Fire	42.0%
General Services	45.0%
DDOT - Transportation	49.2%

Using the above rates, the City estimates an additional \$105.1 million in benefits for employees hired as part of the RRI's:

Incremental Benefits	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
Finance/Budget	\$ 0.2	\$ 2.2	\$ 2.8	\$ 2.9	\$ 3.0	\$ 3.1	\$ 3.1	\$ 3.2	\$ 3.3	\$ 3.3	\$ 27.2
Police	\$ 0.6	\$ 3.1	\$ 1.3	\$ 1.6	\$ 1.2	\$ 1.3	\$ 1.4	\$ 1.8	\$ 1.8	\$ 1.9	\$ 16.0
Fire	\$ (0.4)	\$ 1.3	\$ 0.7	\$ 1.9	\$ 1.8	\$ 0.7	\$ 0.4	\$ (0.4)	\$ (0.9)	\$ (1.6)	\$ 3.6
General Services	\$ 0.3	\$ 1.1	\$ 2.0	\$ 2.0	\$ 2.1	\$ 2.2	\$ 2.2	\$ 2.2	\$ 2.3	\$ 2.3	\$ 18.7
DDOT - Transportation	\$ 0.1	\$ 0.7	\$ 0.9	\$ 1.6	\$ 1.8	\$ 1.9	\$ 1.9	\$ 2.0	\$ 2.2	\$ 2.4	\$ 15.6
Law	\$ -	\$ 0.3	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.8	\$ 6.0
Mayor's Office	\$ 0.5	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.7	\$ 0.7	\$ 6.1
Human Resources	\$ -	\$ 0.4	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 5.6
Planning & Development	\$ 0.1	\$ 0.4	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 3.3
Ombudsperson	\$ -	\$ -	\$ 0.2	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 2.4
Labor Relations	\$ -	\$ 0.0	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 1.7
Human Rights / Board of Ethics	\$ -	\$ 0.1	\$ 0.1	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 1.4
Auditor General / Inspector General	\$ -	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 1.1
Airport	\$ -	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.7
Municipal Parking	\$ 0.0	\$ 0.1	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.1)
Buildings and Safety	\$ 0.0	\$ 0.0	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.1)
Elections	\$ -	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.0)	\$ (0.2)
City Clerk	\$ -	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.7)
Non-Departmental (36D Initiatives)	\$ -	\$ (0.2)	\$ (0.3)	\$ (0.3)	\$ (0.3)	\$ (0.4)	\$ (0.4)	\$ (0.4)	\$ (0.4)	\$ (0.4)	\$ (3.0)
Total Incremental Benefits	\$ 1.3	\$ 10.2	\$ 10.2	\$ 12.7	\$ 12.6	\$ 11.8	\$ 11.9	\$ 11.6	\$ 11.5	\$ 11.3	\$ 105.1

The City took a conservative approach to estimating benefits in its RRI's by using higher percentages of payroll estimates than those used in the baseline forecasts:

Benefits as a % of Payroll	2015	2016	2017	2018	2019	2020	2021	2022	2023
Police	34.0%	35.1%	35.9%	36.7%	37.3%	37.7%	38.1%	38.5%	38.9%
Fire	37.0%	38.0%	38.7%	39.5%	40.0%	40.4%	40.7%	41.1%	41.5%
DDOT	44.4%	47.3%	49.8%	51.4%	52.4%	53.0%	53.7%	54.5%	55.3%
Non Uniform	39.2%	40.2%	41.0%	41.7%	42.4%	42.7%	43.1%	43.5%	43.8%

Training

The City is projecting \$54.4 million in training expenditures over the next ten years, beginning in mid FY2015. The estimate includes \$2,000 per employee per year for all non-uniform City employees through FY2017 and \$1,500 per employee per year after FY2017. The City also assumes \$600,000 in yearly city-wide Human Resources training beginning in FY2016. Fire department training to cross train employees and meet minimum grant standards is projected to be \$13.3 million during the time period. Below is a breakdown of training expenditures over the ten years:

Training	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
Employee Training	\$ 0.0	\$ 3.2	\$ 4.9	\$ 4.1	\$ 4.1	\$ 4.0	\$ 4.0	\$ 4.0	\$ 4.0	\$ 4.0	\$ 36.3
Fire Training	\$ 0.3	\$ 4.1	\$ 3.7	\$ 1.6	\$ 0.7	\$ 0.6	\$ 0.5	\$ 0.6	\$ 0.7	\$ 0.4	\$ 13.3
HR Training	\$ -	\$ -	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 4.8
Total Training	\$ 0.3	\$ 7.3	\$ 9.2	\$ 6.3	\$ 5.4	\$ 5.2	\$ 5.1	\$ 5.2	\$ 5.3	\$ 5.0	\$ 54.4

Materials & Supplies

The City expects to spend \$87.1 million in additional materials and supplies related to the RRI's. The largest component is an additional \$65.1 million needed by the General Services department to repair city buildings and to provide adequate

levels of service to the City's operating departments. In addition the City expects to spend \$37.4 million on materials and supplies due to the additional routes projected by DDOT. The Police department expects to spend \$16.2 million on vests, improvements in technology and various other supplies.

The total additional expenditures related to materials and supplies are offset by \$35.8 million of projected cost savings from consolidation of vendors, improved department staffing and process related enhancements. Below is a breakdown of the projected increase in materials and supplies:

Materials and Supplies	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
M&S to Achieve Desired Service Levels	\$ 1.2	\$ 5.5	\$ 7.3	\$ 7.3	\$ 7.3	\$ 7.3	\$ 7.3	\$ 7.3	\$ 7.3	\$ 7.3	\$ 65.1
M&S due to Increased Miles Driven	\$ 0.4	\$ 0.9	\$ 1.9	\$ 3.0	\$ 4.0	\$ 4.5	\$ 5.0	\$ 5.4	\$ 5.9	\$ 6.4	\$ 37.4
Risk Management Technology	\$ -	\$ 0.3	\$ 2.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.7	\$ 0.6	\$ 0.6	\$ 0.6	\$ 7.2
Miscellaneous Police Supplies	\$ -	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.7	\$ 0.6	\$ 0.6	\$ 0.6	\$ 6.0
Vest Replacement	\$ 0.1	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.4	\$ 0.4	\$ 3.1
Finance - Purchasing Savings	\$ 0.0	\$ (2.0)	\$ (2.0)	\$ (2.0)	\$ (5.0)	\$ (5.0)	\$ (5.0)	\$ (5.0)	\$ (5.0)	\$ (5.0)	\$ (35.8)
All Other M&S	\$ 0.3	\$ 0.8	\$ 0.6	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 4.2
Total Material and Supplies	\$ 2.0	\$ 6.6	\$ 11.5	\$ 10.2	\$ 8.3	\$ 8.8	\$ 9.4	\$ 9.6	\$ 10.1	\$ 10.6	\$ 87.1

Risk Management & Insurance

The City is projecting \$50.7 million in savings related to risk management and insurance. The savings are projected as a result of reduced workers comp payments due to an improved risk management function and better claims processing. In addition, the City projects \$2 million of yearly savings due to a reduction in lawsuits through improved risk management. Below is a summary:

Risk Management and Insurance	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
Workers Comp Savings	\$ -	\$ -	\$ (4.0)	\$ (4.0)	\$ (4.0)	\$ (4.0)	\$ (4.0)	\$ (4.0)	\$ (4.0)	\$ (4.0)	\$ (32.0)
Reduction in Lawsuits	\$ -	\$ (2.0)	\$ (2.0)	\$ (2.0)	\$ (2.0)	\$ (2.0)	\$ (2.0)	\$ (2.0)	\$ (2.0)	\$ (2.0)	\$ (18.0)
All Other	\$ -	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.1)	\$ (0.7)
Total Risk Management & Insurance	\$ -	\$ (2.1)	\$ (6.1)	\$ (6.1)	\$ (6.1)	\$ (6.1)	\$ (6.1)	\$ (6.1)	\$ (6.1)	\$ (6.1)	\$ (50.7)

Other Operating Expenditures

Other operating expenditures over the ten year period include:

- Utilities: \$2.6 million in additional costs projected by the General Services department
- Purchased Services:
 - \$4.5 million in savings related to \$6.75 million less outside legal costs due to additional labor in the Law department
 - \$5.7 million in savings due to less involvement from consultants in the Finance department
 - \$1.1 million in additional expenditures related to additional DDOT miles
 - \$1.9 million in additional outside services in the Police department
 - \$1.7 million for storage and maintenance of medical records due to the outsourcing of the Health and Wellness department
 - \$1.3 million in additional actuarial and benefit consulting
 - \$1.2 million in security and planning related to the Airport department.
- Grants: \$20.3 million in grant related costs associated with the Hardest Hit Fund from FY2014-2016
- Other Expenses:
 - \$17.4 million in other savings as a result of the Neighborhood and Lean Process Improvement Program
 - \$7.1 million in costs in the Police department mostly related to new facilities

Reorganization/Investment

The City is projecting it will incur an additional \$582 million in capital expenditures and infrastructure improvements in the next 10 years to improve the City's level of services. The City views these initiatives as critical components in stabilizing the City and attracting and retaining quality employees for the City of Detroit.

Technology & Infrastructure

The City's IT department has been underfunded for many years and is in need of a significant upgrade to its operating systems, software and hardware. The City expects to undertake a number of initiatives to improve the current systems in place including:

- \$29 million related to a new ERP System which includes both installation and annual maintenance to improve the City's financial processes and reporting
- \$11.7 million related to City wide hardware upgrades
- \$10.9 million related to data backup centers
- \$10.4 million related to the City-wide installation of Microsoft 365
- \$5.2 million related to the implementation of CityTax

Other significant investments which will provide better services to the citizens of the Detroit include the installation and implementation of a new 311 system, implementation of an integrated public safety system and replacement of handheld Police radios. Below is a breakdown of key IT and infrastructure investments over the next ten years:

IT and Infrastructure	Department	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
ERP System	Finance	\$ -	\$ 7.4	\$ 10.3	\$ 9.0	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 29.0
Replacement of Radios	Police	\$ -	\$ 7.5	\$ 7.5	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 22.0
Implementation of Integrated Public Safety System	Police	\$ -	\$ 4.5	\$ 2.5	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 13.8
Hardware Upgrade	Finance	\$ -	\$ 1.5	\$ 2.0	\$ 2.0	\$ 1.2	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 11.7
Data Back Up Center	Finance	\$ -	\$ -	\$ 4.9	\$ 2.4	\$ 0.2	\$ 0.2	\$ 2.7	\$ 0.2	\$ 0.2	\$ 0.2	\$ 10.9
Microsoft Application Department - 365 Cloud (Net of Savings)	Finance	\$ -	\$ 1.3	\$ 1.1	\$ 1.1	\$ 1.1	\$ 1.1	\$ 1.1	\$ 1.1	\$ 1.1	\$ 1.1	\$ 10.4
311 System	Ombudsperson	\$ -	\$ -	\$ 3.0	\$ 0.5	\$ 0.5	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 7.0
Document Imaging and Management System	Finance	\$ -	\$ 3.0	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 5.4
Implementation of City Tax	Finance	\$ 0.1	\$ 1.7	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 5.2
Upgrades to 36th District Court Technology	Non Departmental	\$ -	\$ 1.6	\$ 0.8	\$ 0.4	\$ 0.4	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 4.2
Citywide Network Infrastructure	Finance	\$ -	\$ 2.0	\$ -	\$ -	\$ 1.1	\$ -	\$ -	\$ 1.1	\$ -	\$ -	\$ 4.2
Security Access System to Building	Finance	\$ -	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 3.8
Workbrain Upgrades	Finance	\$ 1.1	\$ -	\$ -	\$ -	\$ 1.2	\$ -	\$ -	\$ -	\$ 1.3	\$ -	\$ 3.6
Fire Vehicle Technology Upgrade	Fire	\$ -	\$ 0.7	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.7	\$ 0.1	\$ 0.1	\$ 0.1	\$ 2.2
Helpdesk Software	Finance	\$ -	\$ 1.6	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 2.0
Active Directory Service Migration	Finance	\$ -	\$ 1.3	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 2.0
Cashiering Controls	Finance	\$ -	\$ 1.4	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1.4
HR Learning Center and Implementation	HR	\$ -	\$ 0.5	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 1.3
Operating System Upgrade	Finance	\$ -	\$ 1.0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1.0
SQL Server Update	Finance	\$ -	\$ 0.2	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.7
All Other	Various	\$ 1.9	\$ 3.6	\$ 0.5	\$ 0.5	\$ 0.5	\$ 0.5	\$ 0.6	\$ 0.7	\$ 0.5	\$ 0.5	\$ 9.8
Total IT and Infrastructure		\$ 3.1	\$ 41.3	\$ 34.4	\$ 19.6	\$ 10.1	\$ 7.4	\$ 10.7	\$ 8.8	\$ 8.8	\$ 7.5	\$ 151.7

Capital Expenditures

The City has identified a number of facility-related capital expenditures including current facility repairs and new or replacement facilities, some of which are itemized below.

- \$40.3 million for repairs and space consolidation across all City buildings
- \$37 million for facility improvements and emergency repairs to the various parks and recreation centers

- \$34.2 million for a new Police training facility, new precincts and various improvements to current buildings
- \$71.3 million for Fire department improvements including \$31.2 million in repairs and maintenance to current firehouses, \$21 million for 7 new firehouses and \$19 million in new gear and equipment
- \$15.7 million in required airport upgrades by the Department of Transportation
- \$10.3 million in system and equipment upgrades for DDOT that are not grant funded.

The chart below details the capital expenditures the City is projecting over the ten year period:

Capital Expenditures	Department	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
Department City Wide Projects and Space Consolidation	GSD	\$ 1.2	\$ 5.1	\$ 7.2	\$ 4.8	\$ 3.8	\$ 3.6	\$ 3.6	\$ 3.8	\$ 3.7	\$ 3.7	\$ 40.3
Facility Improvements/Upgrades and Emergency Repairs	Recreation	\$ 0.9	\$ 4.8	\$ 4.1	\$ 4.8	\$ 4.0	\$ 4.5	\$ 3.9	\$ 3.3	\$ 3.3	\$ 3.3	\$ 37.0
Department wide improvement projects, New Training Facility and New Precincts	Police	\$ 0.7	\$ 13.7	\$ 6.5	\$ 0.1	\$ 0.5	\$ 0.2	\$ 3.3	\$ 3.1	\$ 3.0	\$ 3.0	\$ 34.2
R&M of Fire Department Facilities	Fire	\$ 1.1	\$ 3.0	\$ 5.5	\$ 2.4	\$ 1.1	\$ 2.0	\$ 5.1	\$ 4.1	\$ 3.0	\$ 4.0	\$ 31.2
New Firehouses	Fire	\$ -	\$ -	\$ 3.0	\$ 3.0	\$ 3.0	\$ 6.0	\$ 3.0	\$ 3.0	\$ -	\$ -	\$ 21.0
Gear and equipment	Fire	\$ 2.0	\$ 3.0	\$ 1.4	\$ 2.1	\$ 1.7	\$ 1.7	\$ 1.7	\$ 1.5	\$ 2.4	\$ 1.5	\$ 19.0
Executive Bay Upgrades, New Jetway, Terminal Upgrades and Other Improvements	Airport	\$ -	\$ 0.4	\$ 5.0	\$ 5.3	\$ 5.0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 15.7
ERP, Security, Fleet Mgt, Radio, AVL & APC System Upgrades (All Non Grant Funded)	DDOT	\$ -	\$ 1.6	\$ 2.0	\$ 2.3	\$ 2.5	\$ 1.0	\$ 1.0	\$ -	\$ -	\$ -	\$ 10.3
Herman Keifer Demolition Costs	Health and Wellness	\$ -	\$ -	\$ 5.1	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 5.1
R&M for buildings	Non Departmental	\$ -	\$ 1.0	\$ 0.5	\$ 0.5	\$ 0.5	\$ 0.5	\$ 0.5	\$ 0.5	\$ 0.5	\$ 0.5	\$ 5.0
Upgrades to Caniff Impound Lot	Parking	\$ -	\$ 0.7	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 2.0
Training Location	HR	\$ -	\$ -	\$ 1.0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1.0
All Other	Various	\$ -	\$ 0.4	\$ 0.3	\$ 0.6	\$ 0.3	\$ -	\$ 0.5	\$ 0.5	\$ 0.5	\$ 0.5	\$ 3.7
Total CapEx		\$ 5.9	\$ 33.5	\$ 41.7	\$ 26.1	\$ 22.4	\$ 19.5	\$ 22.7	\$ 20.0	\$ 16.7	\$ 16.8	\$ 225.4

Fleet

The City reviewed the current condition of vehicles in the Police, Fire, GSD and Parking departments. The City projected the number of vehicles needed by department to supply adequate levels of service to the City. The City then projected the cost per vehicle and projected life cycles for each vehicle to determine the yearly number of vehicles to be purchased and the related cost.

- The Police Department projects an average life cycle of 3.5 years resulting in 270 new scout cars costing \$91.3 million over the next ten years
- Fleet purchases for the Fire Department include \$40 million for new purchases and \$18.6 million for repairs of their current fleet
- The General Services department projects spending \$6.4 million over the next ten years on purchases of new vehicles and equipment and \$9.7 million on upgrades to City owned parks
- The Parking Department expects to spend \$1.4 million over the next ten on vehicles

The chart below outlines fleet spending over the ten year period:

Fleet	Department	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
Fleet replacement - Police	Police	\$ -	\$ 9.5	\$ 11.7	\$ 10.0	\$ 10.0	\$ 10.0	\$ 10.0	\$ 10.0	\$ 10.0	\$ 10.0	\$ 91.3
Fleet Replacement Program and Preventive Maintenance Program	Fire	\$ 6.2	\$ 11.7	\$ 9.0	\$ 5.9	\$ 5.7	\$ 4.9	\$ 5.1	\$ 4.5	\$ 3.0	\$ 2.7	\$ 58.6
Upgrade Parks	GSD	\$ 1.2	\$ 3.5	\$ 2.5	\$ 2.5	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 9.7
Replacement of vehicles	GSD	\$ 0.9	\$ 0.7	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 6.4
Fleet replacement - Parking	Parking	\$ -	\$ 0.4	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 1.4
Total Fleet		\$ 8.3	\$ 25.8	\$ 24.0	\$ 19.1	\$ 16.4	\$ 15.7	\$ 15.8	\$ 15.2	\$ 13.7	\$ 13.4	\$ 167.4

Reorganization

The City is expecting to incur various expenses related to implementing the RRI's. These are generally one-time expenses and include:

- \$15.4 million in costs related to reassessing and revaluing all properties in the City
- \$10.2 million related to outside services for strategic planning, facility consolidation and zoning activities
- \$3.7 million for contract employees at the 36th District Court related to restructuring initiatives.

Reinvestment Deferrals

As the City negotiated settlements with creditors and stakeholders, proposed POA payments have taken priority over RRI spending in the near term. As a result, there has been a need to permanently or temporarily defer RRIs in order to maintain adequate levels of liquidity to fund operations and meet the obligations proposed in the POA. The updated July 2nd projections identify all but \$29.8 million of the deferrals as to the individual RRI and the timing. In general, the City sought to defer RRIs that would have the least impact on future revenue and cost savings. If the City enters into additional settlements with creditors, it is likely that additional RRI deferrals will be necessary.

Non Operating Expenditures

The City projected a number of necessary non-operating expenditures in the POA projections. These include one-time costs associated with the chapter 9, decommission of the City's power plants, payments required in the POA and a 1% contingency, among other items. These expenses are detailed below:

<u>Other Non Operating Expenses</u>	<u>10 Year Total</u>
Professional Fees	\$ 130
PLD Decommission	\$ 75
Working Capital	\$ 25
Contributions to Income Stabilization Fund	\$ 18
Secured Debt	\$ 391
QOL Exit Financing	\$ 336
Swap Interest	\$ 104
Contingency	\$ 101
Total Non Operating Expenses	\$ 1,179

Professional Fees

The City projected professional fees for the various constituents involved in the Chapter 9 case. The City projected \$82.2 million and \$47.8 million in professional fees in for FY2014 and FY2015 respectively. The City assumes at the time of emergence the professional fees for the majority of the firms projected will be discontinued. The chart below highlights the professional fees by firm:

Professional Fees	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
City Professional fees											
Conway Mackenzie (Ops)	\$ 14.0	\$ 6.5	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 20.5
Ernst & Young (FA)	\$ 13.4	\$ 4.9	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 18.3
Jones Day (Counsel)	\$ 35.7	\$ 10.9	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 46.6
Miller Buckfire (IB)	\$ 5.4	\$ 19.5	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 24.9
Milliman (actuary)	\$ 1.0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1.0
Total City Professional Fees	\$ 69.5	\$ 41.8	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 111.3
Creditors Professional fees											
Lazard (FA)	\$ 1.8	\$ 0.7	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 2.5
Denton (Counsel)	\$ 13.8	\$ 5.0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 18.8
Brooks Wilkins Sharkey & Turco PLLC (local	\$ 0.8	\$ 0.3	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1.1
Segal (actuary)	tbd	tbd	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Total	\$ 16.3	\$ 6.0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 22.3
Total Creditors Professional fees	\$ 85.8	\$ 47.8	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 133.6
Less: State reimbursements for advisor fees	\$ (3.6)	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ (3.6)
Total Professional fees	\$ 82.2	\$ 47.8	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 130.0

PLD Decommission

Street lights will be transitioned to the Public Lighting Authority during FY2015-2023. The City estimates approximately \$75 million over a ten year period in decommission expenses. The City assumed \$2.4 million for each of its 31 substations. Below are expected expenditures per year:

	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
PLD Decommission	\$ -	\$ 2.5	\$ 5.0	\$ 15.0	\$ 10.0	\$ 10.0	\$ 10.0	\$ 12.5	\$ 10.0	\$ -	\$ 75.0

Working Capital

The City estimates additional expenditures related to working capital in FY2014 of \$39.9 million primarily related to past due vendor payments. This amount is offset by \$20 million in proceeds from a bond escrow fund. The chart below identifies the working capital impact over the next 2 years.

Identified risks and opportunities to 10-year plan	2014	2015	Total
Higher Transportation Dept (DDOT) operating subsidy in CF	\$ 2.0	\$ 5.0	\$ 7.0
Accounts payable vendor risk in CF	\$ 30.0	\$ -	\$ 30.0
Cash escrow reserve requirement for self-insurance	\$ 7.8	\$ -	\$ 7.8
Refunding bond proceeds drawn from escrow	\$ -	\$ (20.0)	\$ (20.0)
Total	\$ 39.8	\$ (15.0)	\$ 24.8

Income Stabilization Fund

The Income Stabilization Fund is the result of negotiations between the City and the PFRS and GRS. \$20 million will be paid to pensioners that meet the following criteria:

- Eligible pensioner's total household income is equal to 130% of the federal poverty Level in 2013 or:
- The annual pension benefit payment payable to each eligible pensioner equals 100% of the annual pension benefit payment actually received by the eligible pensioner in 2013, whichever amount is lower.

The payments will be made over a 14 year period from excess funds from the UTGO property Tax Millage after accounting for UTGO Secured debt payments and Note A UTGO debt payments. Below highlights the projected payments over the ten year period:

	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
Income Stabilization Fund	\$ 2.5	\$ 2.3	\$ 2.3	\$ 2.2	\$ 2.1	\$ 2.1	\$ 2.0	\$ 1.3	\$ 1.1	\$ 17.8

Secured Debt

The City projects debt payments for secured debt to continue to be paid via the same amortization schedules used prior to filing Chapter 9. Below is the detailed amortization schedule for each tranche of debt:

	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
UTGO Secured Debt											
Beginning Principal - UTGO DSA	\$ 100.0	\$ 98.4	\$ 96.5	\$ 94.4	\$ 92.2	\$ 89.8	\$ 87.2	\$ 84.5	\$ 81.6	\$ 78.4	\$ 100.0
Principal	\$ 1.6	\$ 2.0	\$ 2.1	\$ 2.2	\$ 2.4	\$ 2.5	\$ 2.7	\$ 2.9	\$ 3.2	\$ 3.4	\$ 25.0
Ending Balance	\$ 98.4	\$ 96.5	\$ 94.4	\$ 92.2	\$ 89.8	\$ 87.2	\$ 84.5	\$ 81.6	\$ 78.4	\$ 75.0	\$ 75.0
Interest	\$ 8.0	\$ 7.9	\$ 7.8	\$ 7.7	\$ 7.5	\$ 7.4	\$ 7.2	\$ 7.0	\$ 6.8	\$ 6.6	\$ 73.8
LTGO Secured											
Beginning Principal - LTGO DSA	\$ 249.8	\$ 245.5	\$ 238.8	\$ 231.8	\$ 224.5	\$ 216.7	\$ 208.6	\$ 200.0	\$ 191.0	\$ 181.7	\$ 249.8
Principal (Based on Set-Asides)	\$ 4.3	\$ 6.7	\$ 7.0	\$ 7.4	\$ 7.7	\$ 8.1	\$ 8.6	\$ 9.0	\$ 9.4	\$ 9.8	\$ 78.0
Ending Balance	\$ 245.5	\$ 238.8	\$ 231.8	\$ 224.5	\$ 216.7	\$ 208.6	\$ 200.0	\$ 191.0	\$ 181.7	\$ 171.8	\$ 171.8
Interest (Based on Set-Asides)	\$ 12.6	\$ 12.4	\$ 12.0	\$ 11.7	\$ 11.3	\$ 10.9	\$ 10.5	\$ 10.1	\$ 9.7	\$ 9.3	\$ 110.3
LTGO Secured - 2012 Refinancing											
Beginning Principal (For GF, actual Debt Service different)	\$ 129.5	\$ 126.6	\$ 122.2	\$ 117.6	\$ 112.7	\$ 107.6	\$ 102.3	\$ 96.7	\$ 90.9	\$ 84.7	\$ 129.5
Principal	\$ 2.9	\$ 4.4	\$ 4.6	\$ 4.9	\$ 5.1	\$ 5.3	\$ 5.6	\$ 5.8	\$ 6.1	\$ 6.5	\$ 51.3
Ending Balance	\$ 126.6	\$ 122.2	\$ 117.6	\$ 112.7	\$ 107.6	\$ 102.3	\$ 96.7	\$ 90.9	\$ 84.7	\$ 78.3	\$ 78.3
Interest	\$ 6.1	\$ 6.0	\$ 5.8	\$ 5.6	\$ 5.4	\$ 5.1	\$ 4.9	\$ 4.7	\$ 4.4	\$ 4.1	\$ 52.2
Yearly Secured Debt Payments	\$ 35.4	\$ 39.4	\$ 39.4	\$ 39.4	\$ 39.4	\$ 39.4	\$ 39.5	\$ 39.5	\$ 39.5	\$ 39.6	\$ 390.5

Quality of Life/Exit Financing

The City plans to draw down \$292.7 million on its \$300 million Exit Facility by the end of FY2016. The current quality of life loan is expected to be refinanced as part of the exit facility at the emergence of bankruptcy. The Exit Facility bears interest at 6% and matures in 2026. The City begins to make principal payments on the loan starting in 2019.

Swap Interest

The City assumes the agreed upon settlement of the PFRS and GRS Swaps of \$85 million at emergence from bankruptcy. The City has continued to make quarterly swap payments while in bankruptcy. The payments made to date will be

deducted from the final payment made at settlement. Below are the projected payments in FY2014 and FY2015 and reconciliation of the final payment assumed to occur in October 2014:

	2014	2015	Total
POC Swaps			
PFRS Interest	\$ 29.6	\$ 10.2	\$ 39.8
GRS Interest	\$ 16.3	\$ 5.5	\$ 21.9
POC Swap Payment	\$ 45.9	\$ 15.7	\$ 61.6
Swap Settlement		\$ 42.1	\$ 42.1
Total Swap Payments	\$ 45.9	\$ 57.8	\$ 103.8

Reconciliation of Final Payment	Total
Settlement	\$ 85.0
FY14 int. payments (Post Bankruptcy)	\$ 27.2
FY15 Int. payments (Prior to Emergence from Bankruptcy)	\$ 15.7
Bulk payment in Oct, 2014	\$ 42.1

Contingency

The City assumed a yearly contingency estimate of 1% of total revenue. Total revenue includes revenue from the base plan, revenue from the RRI's and proceeds from the Exit Facility. Total contingency is \$101 million over the ten year period. Public Acts 181 and 182 of 2014, part of the so called Grand Bargain legislation requires a contingency of not less than 5% of projected expenses in each year. This difference in the amount of contingency is approximately \$40 million in FY2015.

Section I - Systems, Controls and Reporting

Introduction

“The effective use of technology is an essential foundation of a modern, efficient and effective government, and that absent a modernized IT infrastructure, a city is unable to adequately deliver government services for the public.”³⁶

This quote is from Beth Niblock’s Report filed in connection with the Detroit bankruptcy. Ms. Niblock, the City of Detroit’s Chief Information Officer, also concludes in her report that: “The City’s information technology is deficient”.³⁷ I agree that a working technological platform allows the City to properly operate. I also believe that the City’s IT infrastructure is so broken that, left unaddressed, threatens the City’s ability to meet the commitments in the POA. The City’s current technology infrastructure problems are the direct result of long term, systematic underfunding and lack of leadership.

³⁶ Report of Beth Niblock, Chief Information Officer for the City of Detroit; in re: City of Detroit, para 6 page 3.

³⁷ Report of Beth Niblock, Chief Information Officer for the City of Detroit; in re: City of Detroit, para 4.A. page 3.

Nowhere is this failure as evident as it is in the City's Finance departments. The lack of accounting and financial information systems confounds virtually every City operation and makes it difficult to perform even basic analysis or performance monitoring. The Emergency Manager's description below provides a realistic picture of the City's current systems:

*"The City's core financial, accounting and budgeting systems similarly suffer from the lack of modern IT. The City's financial reporting and budget development systems: (a) are 10 to 15 years old; (b) require a manual interface (70% of journal entries are booked manually); (c) lack reliable fail-over and back-up systems; and (d) lack a formal, documented IT governance structure, all of which impairs the reporting, efficiency and accuracy of the data and the accountability of the systems. The City's grant tracking systems are fragmented and unstandardized to the extent that the City is unable to comprehensively track citywide grant funds and status or prevent disallowed costs. Aged IT infrastructure within the City's Buildings, Safety Engineering and Environmental Department ("BSEED") and the DFD leads to bottlenecks in permit invoicing and collections...."*³⁸

These issues will not be addressed overnight, nor will they be easy. The funding, implementation, and management of new information and reporting systems are critical to adequately deliver government services to the public. The City has accumulated dozens of non-integrated systems which make it impossible to obtain the timely and reliable systemic information necessary for efficient operations and informed decision making. The remainder of this section will discuss some

³⁸ Declaration of Kevyn Orr in Support of City of Detroit, Michigan's Statement of Qualifications Pursuant to Section 109 (c) of the Bankruptcy Code. Page 30, para 41.

particular challenges with accounting and financial controls and reporting and conclude with a discussion of the broader issues surrounding the investments the City must make in IT.

Accounting Controls and Processes

Of all of the measurable impacts of the City's IT, Accounting Control and Reporting problems, perhaps the most visible is the impact on the City's financial reporting, which affects the ability of City leaders and department heads to make real time, informed decisions. In the City's 2012 Independent Auditors Report, KMPG states:

“Although the City of Detroit (City) has made incremental improvement in their financial closing and reporting processes, deficiencies still exist in the processes to evaluate accounts, and timely record entries into the general ledger in a complete and accurate manner”³⁹

Historically, the City has not performed monthly closings or published monthly financial statements. The City's accounting “closing” process is so inefficient that recent attempts the City has made to implement a monthly General Ledger (“G/L”) closing and financial statement preparation process have failed.

³⁹ Independent Auditors' Report on Internal Control over Financial Reporting and on Compliance and Other Matters Based on an Audit of Financial Statements Performed in Accordance with Government Auditing Standards, KPMG, 2012, Pg 3

Going forward, I believe the City needs to prioritize monthly financial reporting against the City's budget. A monthly closing process will enable the City's leaders to make the continuous large and small adjustments needed to promote directional compliance with the Plan.

KPMG has determined the City's system of internal accounting controls and procedures are so weak that KPMG cannot rely on them when performing the year-end audit. The ineffectiveness of the current financial systems does not allow the City to internally perform essential daily tasks such as account reconciliations, bank reconciliations, and account analysis, which are the cornerstones of good accounting controls. Rather, these activities are performed once a year by outside consultants as part of preparation for the annual audit process. To that end, KPMG performs substantive testing of all accounts to its materiality threshold in order to render an opinion on the City's financial statements and explains why it takes the City about twelve months to prepare fiscal year-end financial reports.

Financial Reporting

Perhaps the only standardized financial reporting that the City undertakes is the development of the Comprehensive Annual Financial Report ("CAFR") which is promulgated by the Government Finance Officers Association. The CAFR is

essentially a comprehensive look at the City's financial position and performance. The City's CAFR for the fiscal year ended June 30, 2013 has not been released as of the date of this Report.

Another of the City's major reporting tasks is performed by Ernst & Young. E&Y prepares daily, weekly and monthly reports of cash, revenues, and expenditures. These reports track the City's available cash using bank statements and numerous other City documents that report one or more cash activities. These reports are independently generated and are not reconciled to the City's general ledger system through account reconciliations or bank reconciliations. These E&Y reports are consolidated for multiple accounting periods, as well as reported separately in other City reports including those of the Emergency Manager. The current cash management and cash reporting system has been managed by E&Y personnel since before the appointment of the Emergency Manager. It is my understanding that the City has not budgeted for E&Y continuing in this role after confirmation, nor has the City made accommodations to take over this work from E&Y. This is an unacceptable risk to the success of the POA and the City must identify and fund a solution for both the near term and longer term.

Whenever contemporaneous financial information is required, the City has no choice but to rely on the incomplete and unreliable financial data from the G/L system. As such, external reports such as the Emergency Manager's reports to Financial Advisory Board contain necessary disclaimers such as:

“The revenues and expenditures report includes entries that have not been posted in the general ledger and encumbrances. This manner of presentation provides the most up to date data on revenues and expenditures. Unposted entries are preliminary and subject to review before they are finalized; therefore, actual results will likely be different from the preliminary results presented herein, and those differences may be material.”⁴⁰

Potential Plan Implications

Beyond financial reporting, the efficient and controlled execution of the accounting and finance functions are essential to achieving the financial initiatives set forth in the Plan. Some of the most important assumptions in the POA depend on improving the accounting and finance function within the City. For example:

- Municipal Income Taxes: the City processes and audits income tax returns, and collects income tax revenues which account for 25% of the City's revenue in FY2014-2023
- Purchasing: the City's purchasing function manages the City's contracts for all commodities and services which are forecasted to total \$3 billion in the next ten years
- Property Taxes: The assessor's office creates the tax rolls used to invoice citizens and commercial customers for real estate taxes which are estimated to account for 9% of the City's revenue in FY2014-2023 and the Treasury department is responsible for the billing and collection function

⁴⁰ Emergency Manager's report

- Grants: Grant funding is expected to increase in the City going forward. In fact, there are additional opportunities for the City to acquire grants if it can responsibly manage and account for them. The City has failed to properly account for and manage grants in the past which has led to improperly spent funds. The City can benefit by tens of millions of dollars if this process is improved

The diminished capacity of these finance departments to execute their basic functions is a result of attrition and an historic failure to invest in people and systems. If the City does not build internal capacity in its finance and accounting functions in a timely fashion, it could threaten the execution of the POA.

Information Technology

The City, as detailed in the Plan, is addressing its system issues with a number of major initiatives funded as part of the RRI's. These IT-related initiatives include:

- \$29 million related to a new Enterprise Resource Planning ("ERP") system, which includes both the installation and annual maintenance to improve the City's financial processes and reporting.
- \$11.7 million related to City-wide hardware upgrades.
- \$10.9 million related to Data Back Up centers.
- \$10.4 million related to the City-wide installation of Microsoft 365.
- \$5.2 million related to the implementation of City Tax.

While the IT department expects to spend almost \$85 million on restructuring initiatives over the next 10 years, the total investment in IT related expenses by the City is upwards of \$150 million. It should be noted that this figure does not include

a budget of \$3 million for the implementation of a replacement payroll system, which is included in E&Y's base line financial projections. We believe the City would benefit with a more centralized control over all IT related investments. The following chart details the significant IT-related restructuring initiatives out of each of the departmental RRI's:

IT and Infrastructure	Department	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Ten Year Total
ERP System	Finance	\$ -	\$ 7.4	\$ 10.3	\$ 9.0	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 29.0
Replacement of Radios	Police	\$ -	\$ 7.5	\$ 7.5	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 22.0
Implementation of Integrated Public Safety System	Police	\$ -	\$ 4.5	\$ 2.5	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 13.8
Hardware Upgrade	Finance	\$ -	\$ 1.5	\$ 2.0	\$ 2.0	\$ 1.2	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 11.7
Data Back Up Center	Finance	\$ -	\$ -	\$ 4.9	\$ 2.4	\$ 0.2	\$ 0.2	\$ 2.7	\$ 0.2	\$ 0.2	\$ 0.2	\$ 10.9
Microsoft Application Department - 365 Cloud (Net of Savings)	Finance	\$ -	\$ 1.3	\$ 1.1	\$ 1.1	\$ 1.1	\$ 1.1	\$ 1.1	\$ 1.1	\$ 1.1	\$ 1.1	\$ 10.4
311 System	Ombudsperson	\$ -	\$ -	\$ 3.0	\$ 0.5	\$ 0.5	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.6	\$ 7.0
Document Imaging and Management System	Finance	\$ -	\$ 3.0	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 5.4
Implementation of City Tax	Finance	\$ 0.1	\$ 1.7	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 5.2
Upgrades to 36th District Court Technology	Non Departmental	\$ -	\$ 1.6	\$ 0.8	\$ 0.4	\$ 0.4	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 0.2	\$ 4.2
Citywide Network Infrastructure	Finance	\$ -	\$ 2.0	\$ -	\$ -	\$ 1.1	\$ -	\$ -	\$ 1.1	\$ -	\$ -	\$ 4.2
Security Access System to Building	Finance	\$ -	\$ 0.6	\$ 0.6	\$ 0.6	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 0.4	\$ 3.8
Workbrain Upgrades	Finance	\$ 1.1	\$ -	\$ -	\$ -	\$ 1.2	\$ -	\$ -	\$ -	\$ 1.3	\$ -	\$ 3.6
Fire Vehicle Technology Upgrade	Fire	\$ -	\$ 0.7	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.7	\$ 0.1	\$ 0.1	\$ 0.1	\$ 2.2
Helpdesk Software	Finance	\$ -	\$ 1.6	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 2.0
Active Directory Service Migration	Finance	\$ -	\$ 1.3	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 2.0
Cashiering Controls	Finance	\$ -	\$ 1.4	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1.4
HR Learning Center and Implementation	HR	\$ -	\$ 0.5	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 1.3
Operating System Upgrade	Finance	\$ -	\$ 1.0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 1.0
SQL Server Update	Finance	\$ -	\$ 0.2	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.7
All Other	Various	\$ 1.9	\$ 3.6	\$ 0.5	\$ 0.5	\$ 0.5	\$ 0.5	\$ 0.6	\$ 0.7	\$ 0.5	\$ 0.5	\$ 9.8
Total IT and Infrastructure		\$ 3.1	\$ 41.3	\$ 34.4	\$ 19.6	\$ 10.1	\$ 7.4	\$ 10.7	\$ 8.8	\$ 8.8	\$ 7.5	\$ 151.7

These initiatives are a significant investment and present an opportunity for the City to improve services and functionality throughout its operations. However, to enhance the City's ability to execute the proposals within the POA, the City will need to manage the execution of the IT initiatives at the most senior level in the City and make sure that it reacts to any material deviations - from cost or timeline - in the implementations.

According to CFO John Hill, the City's strategy to correct this catastrophic decline in essential finance, accounting and IT services has three major components:

- Implement a new payroll system and restructure the existing payroll reporting structure
- Implement a new integrated ERP system without customization accompanied by the implementation of the ERP's "best practices" policies and business processing procedures
- Restructure the existing organization structure, processes and controls.

Replacing the payroll system is considered to be of the highest priority by everyone we spoke with. Under the existing organization structure, payroll processing reports operationally to the Human Resources department. The Payroll system technology is under the jurisdiction of the City's IT department. Under the envisioned Finance and Accounting reorganization, payroll processing would report to the CFO, as it should.

The second part of this major undertaking is to implement a new, integrated ERP system along with established "Best Practices" for policies, procedures and business processes. The City's IT department will have overall responsibility for the implementation forecasted to take approximately 2-3 years and cost approximately \$29 million.⁴¹ The objective will be to replace the existing Oracle ERP system with an updated, integrated ERP system that will:

- Replace various standalone Finance and Accounting systems
- Eliminate the manual loading of data coming from other stand-alone systems as is done with the current Oracle ERP system
- Improve efficiencies and implement strong systematic internal controls

⁴¹ Per the Conway McKenzie IT restructuring budget.

- Ensure an interim closing process and preparation of interim financial statements and other reporting necessary for the City to manage its financial affairs

The City believes that it will take several years to implement a new ERP system and, in the interim, the City will have to rely on the existing systems. Although many of the inefficiencies and control weaknesses cannot be eliminated, the City believes the main ERP weaknesses can be mitigated by strengthening the organizational structure and hiring employees with enhanced skill sets at all levels and functions, but primarily mid-tier management. John Hill described the City's strategy as:

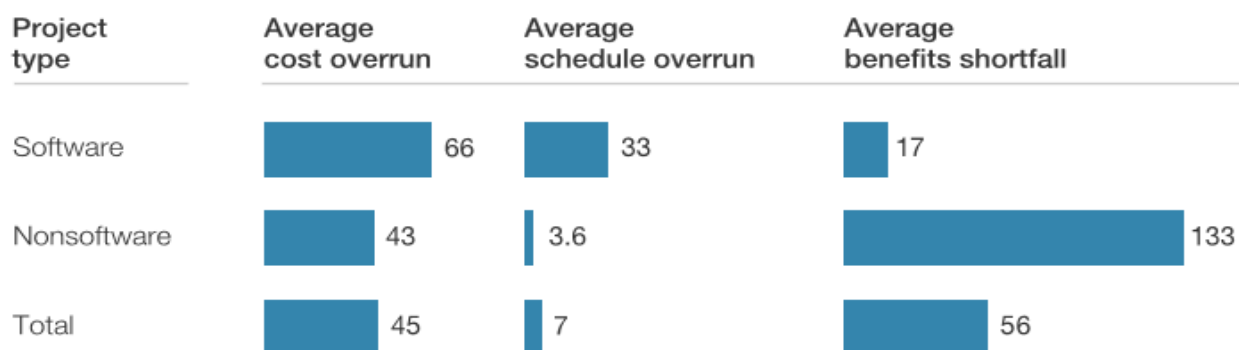
- Restructure the Organization to establish better functionality
 - Implement a flatter, functionally-orientated organization chart
 - Strengthen mid-tier managers to provide better supervision and accountability
 - Establish centralized governance of City-wide Finance and Accounting functions with the CFO or alternative centralized governing body
 - Establish centralized governance of City-wide IT functions with the CIO or alternative centralized governing body.
- Revise and upgrade job descriptions and applicant skill set requirements and qualifications
- Update the City's outdated and uncompetitive compensation structure to enable the City to attract and retain qualified employees
- Implement new recruiting processes
- Implement initiatives aimed at correcting major deficiencies in each department's existing systems and procedures

Risk of Failure

The above strategy was created to help ensure the successful implementation of the IT system initiatives. Large IT systems initiatives have historically contained an inherent risk. McKinsey & Co. notes that:

As IT systems become an important competitive element in many industries, technology projects are getting larger, touching more parts of the organization, and posing a risk to the company if something goes wrong. Unfortunately, things often do go wrong. Our research, conducted in collaboration with the University of Oxford, suggests that half of all large IT projects—defined as those with initial price tags exceeding \$15 million—massively blow their budgets. On average, large IT projects run 45 percent over budget and 7 percent over time, while delivering 56 percent less value than predicted. Software projects run the highest risk of cost and schedule overruns

% of IT projects with given issue (for those with budgets >\$15 million in 2010 dollars)



Source: McKinsey–Oxford study on reference-class forecasting for IT projects

The root causes of cost overruns in IT systems implementations for projects over \$15 million include: unclear objectives and lack of business focus, shifting

requirements and technical complexity, unaligned teams, lack of skills, unrealistic schedule and reactive planning.⁴²

Impact on Feasibility

The risks associated with the IT initiatives alone, warrant additional financial contingency beyond the general 1% assumption in the POA projections. Systems, controls and reporting concerns are high on the list of long term threats to feasibility. It is critical that the City effectively implements the IT initiatives which lay the foundation of many of the other benefits associated with the RRI's. Detroit will need strong leadership and exceptional tenacity to accomplish the initiatives on time and on budget.

I am encouraged by the City's recent decision to terminate its efforts to outsource payroll due to a poor design for the implementation. Current City leadership appropriately abandoned this project, despite having previously spent several million dollars in the pre-implementation phase, when they realized the vendor was trying to automate the City's antiquated payroll system rather than implement a new system that would meet the needs of the City going forward. This exemplifies why the most senior levels of City leadership, including the Mayor, CFO

⁴² McKinsey Report on the City of Detroit, May 2011

and CIO, must be actively involved in the strategy and implementation plans to ensure success and progress with clear measurement metrics.

Section J - Pensions

Introduction

Detroit's legacy retirement obligations, combining both pensions and OPEB, are the City's largest liability when combining the funded and unfunded liabilities. Additionally, these liabilities are arguably the most visible to the City's retirees, current employees, and to its citizens, generally. Despite the relative importance, the magnitude of the City's retirement obligations and the methods for calculating them are largely unknown. Assessing the City's future pension and OPEB responsibilities involves, among other factors, forecasted health care costs, complex actuarial models⁴³, and assumptions for the anticipated rate of returns on the pensions' assets and the rate used to discount the plans' future liabilities. Critical decisions made today will have a substantial impact on the City's liquidity in future

⁴³ Traditional actuarial forecasts imbed assumptions related to pensioners' mortality, rates of retirement, salary increases, overtime, disability rates, interest earned on assets, and pension plan administrative expenses.

years. The magnitude and importance of these decisions will be critical to Detroit's viability in the decades to come.

Background

The City of Detroit has historically maintained two separate defined benefit plans, one for uniformed personnel and one for all other City employees. The City's existing pension plans are administered by the respective Retirement Systems, the Police & Fire Retirement System of the City of Detroit ("PFRS") and the General Retirement System of the City of Detroit ("GRS"). The bankruptcy claims related to PFRS claims are classified as Class 10, while the GRS claims are designated as Class 11 in the POA. These plans provided for a calculated amount of retirement income based on earnings and longevity of each individual employee. As typical with defined benefit plans, the benefits are fixed and are not dependent on investment returns or other outside factors.

Detroit's Plan, in an effort to mitigate the City's expanding legacy pension issues, proposes to fundamentally restructure the City's pension obligations for both its current retirees and its active employees, effective June 30, 2014. The Plan provides that, on the Effective Date, the City will assume the obligations related to already accrued benefits under the GRS and the PFRS pension plans *as those benefits will have been modified in the POA*. The POA pension proposal modifies

each plan under revised structures that impose reduced monthly pension amounts and/or reduced or eliminated COLA adjustments. The POA also proposes to restructure the accrual of pension benefits of active employees beginning on July 1, 2014, the parameters of which are detailed below.

City of Detroit Retirees Demographics

As of June 30, 2013, the Retirement Systems for the City of Detroit had approximately 32,247 members. The demographics of the each Retirement System are detailed below:

	PFRS		GRS		RS Total	
Active	3,272	26%	5,658	28%	8,930	28%
Retirees	9,054	73%	12,118	61%	21,172	65%
Other	<u>111</u>	1%	<u>2,214</u>	11%	<u>2,325</u>	7%
	12,437		19,990		32,427	

Of the City's estimated 21,172 retirees, roughly 7,200 (or 34%) are over the age of 75, with another 35% between the ages of 65 and 75. The average PFRS pension in FY2013 was \$30,607 as compared to the average FY2013 GRS pension of \$19,213.

Pension Funding Level

The accounting for defined benefit plans can be very complex. The calculations used to determine the appropriate funding levels required each year are dependent upon macro-economic factors, actuarial assumptions, and other variables that can be difficult to understand and can be manipulated to bias the required funding levels.⁴⁴

Historically, a number of different practices have contributed to a significant funding shortfall in the two pension plans. The Retirement Systems utilized unrealistic rate of return assumptions and managed the pension plans in accordance with questionable investment strategies that resulted in considerable underfunding of the respective Plans. The Retirement Systems assumed aggressive annual rates of return on investment (PFRS: 8.0%; GRS: 7.9%), allocated asset gains and losses over a seven-year period which masked potential funding shortfalls, and utilized renewing 29- (PFRS) and 30- (GRS) year amortization periods for funding the unfunded pension obligations.

The calculation of this funding shortfall, or the Unfunded Actuarial Accrued Liability (“UAAL”), is dependent upon the use of assumptions as noted above.

⁴⁴ Declaration of Charles M. Moore in Support of Detroit, Michigan’s Statement of Qualifications Pursuant to Section 109(c) of the Bankruptcy Code; Docket No. 13; Page 5

Based on the assumption methodologies used by the retirement systems previously, the UAAL was projected, at the end of FY2012, to have been approximately \$977 million.⁴⁵ At June 30, 2013, that UAAL estimate was \$1.5 billion as PFRS reported it was 89% funded with a UAAL of \$415 million. At that same time, GRS reported it was 70% funded with a UAAL of \$1.1 billion. Using what the City now believes are more accurate assumptions, the City's actuary - Milliman, Inc. - has estimated that the combined systems' UAAL, at June 30, 2013, was approximately \$3.5 billion.⁴⁶

In addition to issues involving the aggressiveness of the rate of return assumption used to determine funding levels, also contributing to the increase of the UAAL were a number of questionable activities engaged in by the retirement systems, which included:

- Utilizing GRS fund assets to pay the promised returns on the Annuity Savings Program which, upon members of GRS allocating 3%, 5% or 7% of their after-tax salaries into a discreet defined contribution plan, effectively guaranteed a minimum 7.9% annual investment return

⁴⁵ Declaration of Charles M. Moore in Support of Detroit, Michigan's Statement of Qualifications Pursuant to Section 109(c) of the Bankruptcy Code; Docket No. 13; Page 5

⁴⁶ Declaration of Charles M. Moore in Support of Detroit, Michigan's Statement of Qualifications Pursuant to Section 109(c) of the Bankruptcy Code; Docket No. 13; Page 7

- regardless of the actual investment performance of the pension plans' assets;
- Using actual market returns for crediting purposes rather than the guarantee, the City believes that over \$387 million of excess investment earnings were credited to Annuity Savings Funds from 2003-2013
 - GRS trustees, when the plan's actual returns were higher than the assumed rate of return, paid a portion of the positive variance between the actual investment return and the assumed rate of return in an additional pension check to already retired pensioners in what is commonly referred to as the "13th check" program
 - The City periodically deferred its required year-end PFRS contributions, and then borrowed to pay those deferrals with debt priced at a rate of 8%;
 - Retirement System officials have been accused and/or indicted of material fiduciary misconduct, allegedly draining the pension of necessary liquidity and contributing to the underfunding of the Retirement Systems.⁴⁷

Pension Treatment

The City's Plan of Adjustment proposes to "freeze" the accruing of pension benefits under the terms of the City's legacy pension plans and, effective June 30, 2014, institute restructured, distinct pension plans for the City's active employees. For the current employees, their future pensions will be a combination of that which was accrued under the legacy plan through June 30, 2014, and after that date, what will be accrued under the new revised plan as detailed below. For the City's retirees,

⁴⁷ Declaration of Charles M. Moore in Support of Detroit, Michigan's Statement of Qualifications Pursuant to Section 109(c) of the Bankruptcy Code; Docket No. 13; Page 10

depending on whether they are members of PFRS or GRS, the POA proposes to modify their accrued benefits under the legacy pension plans via reductions in gross pensions, cost of living adjustments, or reductions in investment earnings in the Annuity Savings Program.

Active City Employees

The Plan of Adjustment proposes a “hybrid” pension plan for the City’s active employees for their accrued employment time after June 30, 2014. The adjusted pension plan – for both PFRS and GRS – endeavors to combine the features of a fixed contribution plan with the estimated investment performance of a fixed benefit plan. The City and its actuaries constructed this hybrid plan to generate accrued pension payments to its active employees upon retirement commensurate with a 6.75% estimated annual investment return.

For active PFRS employees, the updated pension formula will be equivalent to their Final Average Compensation (“FAC”) – defined as the average base compensation (excluding overtime, sick leave, longevity, etc. over the last ten consecutive years) times years of service times 2.0%. For example, a theoretical PFRS employee whose FAC was \$40,000 with 25 years of experience would accrue an annual pension of \$20,000 ($\$40,000 \times 25 \times 2.0\%$). This calculation represents

the defined benefit portion of the new hybrid plan. The defined contribution portion of the new plan incorporates an annual 12.25% contribution from the City of employees' base compensation and requires an employee contribution of 6%, if the employee was hired before July 1, 2014, or 8% if hired after that date. In addition, PFRS employees will be eligible for retirement at ages 50-52, depending on their rank, with twenty-five years of service.

The revised GRS pension plan for active employees is similar to the PFRS plan, albeit adjusted for Social Security (GRS pensioners are eligible for Social Security in contrast to PFRS pensioners). The updated pension formula will be equivalent to FAC over the last ten consecutive years times years of service times 1.5%. For example, a theoretical GRS employee whose FAC was \$40,000 with 30 years of experience would accrue an annual pension of \$18,000 ($\$40,000 \times 30 \times 1.5\%$). The City will contribute 5.75% of the employee's base compensation annually, while the employee will contribute 4%. In addition, GRS employees will be eligible for retirement at age 55 with thirty years of service.

Proposed POA Restructured Terms

	PFRS	GRS
Pension Formula	FAC x # of years x 2.0%	FAC x # of years x 1.5%
Investment Return	6.75%	6.75%
ER Contribution	11-12% of base compensation	5% of base compensation
EE Contribution	Hired before 7/1/14: 6%; after 7/1/14: 8%	4% of base compensation
Retirement Age	Age 50-52 with 25 years experience	Age 55 with 30 years experience
COLA Eligibility	0-1% compounded, variable	Variable after 4 years and 100% funded
Annuity Savings Fund	n/a	Interested credit at actual return (0-5%)
Theoretical Annual Pension (\$40k FAC with 25/30 years experience)	\$20,000 = \$40,000 x 25 x 2.0%	\$18,000 = \$40,000 x 30 x 1.5%

The fundamental amendments to the future pension plans lend themselves favorably to the POA's feasibility. Redefining base compensation as an average of the last ten years' pay as opposed to last three, eliminating non-base compensation such as overtime and sick leave from the calculation, reducing the estimated rate of return, and incorporating a defined employee contribution all contribute to the increased likelihood that the City can meet the requirements of the new pension plan. A concern remains, though, that embedded within the "hybrid" nature of this pension plan, is the concept that a fixed contribution will, *over time*, produce the required, fixed benefit. Pension plans with fixed contributions are generally just that -- defined contribution plans, not defined benefit plans. To the degree that the actual investment return underperforms the targeted levels or the employee population exhibits life expectancies in excess of the actuarial assumptions, the City has the potential to again be saddled with an underfunded pension plan.

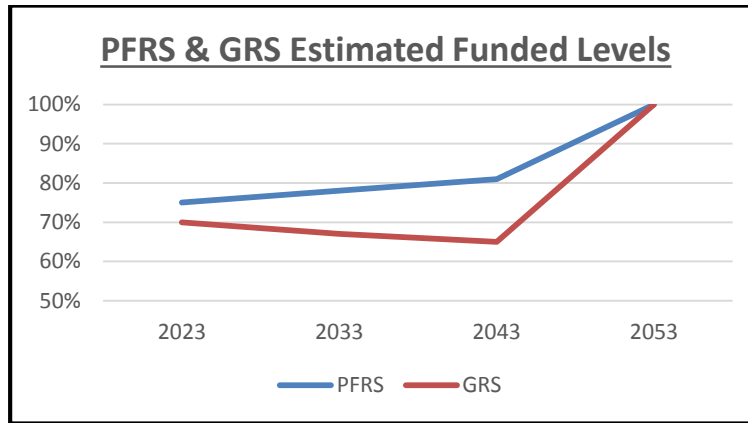
Current Retirees

The combined UAAL for both Retirement Systems was approximately \$3.5 billion as of June 30, 2013. The City's Plan of Adjustment, for the current retirees' pension plan, establishes targeted funding rates by the end of fiscal year 2023 for each Retirement System, specifically 75% for PFRS and 70% for GRS, based upon a heavily-negotiated 6.75% assumed investment rate of return. While I assume this investment rate of return as a "given" in all pension analyses to follow, further discussion with regards to the appropriateness of this assumed investment rate of return, and more particularly, its use as the assumed liability discount rate, is detailed below. These targeted funding levels, combined with the proposed benefit reductions for each pension plan, dictate the required cash contributions to the Retirement Systems during the period ending June 30, 2023. The POA proposes that the City will amortize the remaining UAAL for each Retirement System – as of June 30, 2023 – over the following thirty-year timeframe.

The following graph illustrates, per the City's actuary – Milliman, Inc. – the estimated funding levels for PFRS and GRS at ten-year intervals during the period FY2014-2053⁴⁸. Based on the City's actuarial tables, the POA projections assume

⁴⁸ Both PFRS and GRS plans are forecasted to initially have decreasing funding levels; PFRS is forecasted to decrease from 87% in FY2015 to 78% in 2023; GRS is estimated to decrease from 74% in FY2015 to 65% in FY2043

that the pension plans' funding levels significantly improve in the last ten years of this forty year period in question⁴⁹.



The POA assumed investment rate of return of 6.75% was a heavily negotiated component of the POA amongst the City, its retirees, the Retirement Systems, the Retiree Committee, and the labor unions. The POA stipulates that the board of trustees of the PFRS and GRS “must” maintain a 6.75% investment return assumption through the period ending June 30, 2023; thereafter, that rate is at the discretion of the Retirement Systems. While the new, proposed rate is more conservative than the historically-used 7.9% and 8.0% rates, current debate abounds as to whether a municipal pension plan, that is not 100% funded, should use any rate for its liability discount rate other than the government risk-free rate.

⁴⁹ Milliman, Inc. letter, dated May 7, 2014

The following table illustrates where the City's proposed 6.75% investment rate compares to other comparable municipal pension plan assumptions⁵⁰:

<u>Public Pensions - Assumed Investment Returns - Dec 2013</u>	
City of Detroit	6.75%
Connecticut Teachers	8.50%
Houston Firefighters	8.50%
Ohio Police & Fire	8.25%
Ohio PERS	8.00%
Michigan Municipal/SERS/Public Schools	8.00%
U.S. National Average	7.72%
CALPERS	7.50%
Indiana PERF/Teachers	6.75%
DC Police & Fire/Teachers	6.50%

Pension Funding

In an effort to partially alleviate the City of Detroit's liquidity concerns and to fund some portion of the proposed RRI's in the first ten years, the Plan of Adjustment incorporates dedicated external funding for the Retirement Systems aimed at reducing the respective UAALs, portions of which the receipt is predicated upon Classes 10 (PFRS) and 11 (GRS) voting to accept the Plan. The following analyses illustrate the POA's proposed funding sources for the respective Retirement Systems over the 2014-2053 timeframe encompassed in the POA's 40 Yr Plan.

Plan of Adjustment – Proposed PFRS Contributions – FY2014-2053

⁵⁰ NASRA Issue Brief: "Public Pension Plan Investment Return Assumptions"; April 2014

(\$ Millions)	2014 - 2023	2024 - 2033	2034 - 2043	2044 - 2053
City-specified Contributions				
State of Michigan	\$ 96	\$ -	\$ -	\$ -
Foundations (DIA Settlement)	\$ 165	\$ 201	\$ -	\$ -
Other/City GF	\$ -	\$ 416	\$ 465	\$ 311
Total	\$ 261	\$ 618	\$ 465	\$ 311

Plan of Adjustment – Proposed GRS Contributions – FY2014-2053

(\$ Millions)	2014 - 2023	2024 - 2033	2034 - 2043	2044 - 2053
City-specified Contributions				
DWSD	\$ 429	\$ -	\$ -	\$ -
UTGO	\$ 32	\$ -	\$ -	\$ -
State of Michigan	\$ 99	\$ -	\$ -	\$ -
DIA (DIA Settlement)	\$ 45	\$ 55	\$ -	\$ -
Other/City GF	\$ 115	\$ 575	\$ 474	\$ 318
Total	\$ 719	\$ 630	\$ 474	\$ 318

In order of magnitude, the City-specified contributions in the 2nd, 3rd, and 4th decades reflect the estimated 30-year amortization payments on the respective plans' UAALs at June 2023. The DWSD is expected to contribute to GRS roughly \$428 million from FY2015-2023, constituting DWSD's allocable share of the remaining GRS UAAL, after considering the pension modifications proposed in the POA. The State of Michigan has committed to contribute the present value of \$350 million, approximately \$194 million⁵¹, for the benefit of pensioners. The State's contribution, signed into law by Governor Snyder on June 20, 2014, requires the approval of Classes 10 and 11, requires support from the Retirement Systems,

⁵¹ The \$350 million contribution is discounted at the 6.75% rate.

cessation of all bankruptcy-related litigation, and the full commitment of other external financing sources dedicated to the pension plans.

In addition to the identified pension funding sources highlighted above, the POA assumes implementation of the DIA Settlement, in which the City, DIA, and certain charitable foundations agree to irrevocably transfer the DIA art collection to the DIA Corporation. The art will be held in perpetual charitable trust within Detroit's city limits, in exchange for future payments of \$366 million, pledged by the charitable foundations, and a commitment from the DIA Corporation to raise \$100 million. Both DIA Settlement commitments are designated to be paid into the pension plans over the next twenty years.

The following tables illustrate the proposed funding contributions into PFRS and GRS for the fiscal years 2014-2023:

Plan of Adjustment – Proposed PFRS Contributions – FY2014-2023

Fiscal Year	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
<u>City-specified Contributions</u>											
State	\$ -	\$ 96.0	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 96.0
Foundations	\$ -	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 164.7
Other	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -
Total	\$ -	\$ 114.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 260.7

Plan of Adjustment – Proposed GRS Contributions – FY2014-2023

Fiscal Year	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
<u>City-specified Contributions</u>											
DWSD	\$ -	\$ 65.4	\$ 45.4	\$ 45.4	\$ 45.4	\$ 45.4	\$ 45.4	\$ 45.4	\$ 45.4	\$ 45.4	\$ 428.6
UTGO	\$ -	\$ 4.4	\$ 4.0	\$ 4.0	\$ 3.9	\$ 3.7	\$ 3.7	\$ 3.6	\$ 2.3	\$ 2.0	\$ 31.6
State	\$ -	\$ 98.8	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 98.8
DIA	\$ -	\$ 5.0	\$ 5.0	\$ 5.0	\$ 5.0	\$ 5.0	\$ 5.0	\$ 5.0	\$ 5.0	\$ 5.0	\$ 45.0
Other/City GF	\$ -	\$ 14.6	\$ 22.5	\$ 22.5	\$ 22.5	\$ 22.5	\$ 2.5	\$ 2.5	\$ 2.5	\$ 2.5	\$ 114.6
Total	\$ -	\$ 188.2	\$ 76.9	\$ 76.9	\$ 76.8	\$ 76.6	\$ 56.6	\$ 56.5	\$ 55.2	\$ 54.9	\$ 718.6

Plan of Adjustment – PFRS (Class 10)

The POA proposes two alternative restructuring scenarios of the PFRS pension, with the respective depth of the assumed pension cuts being dependent on whether **both** Classes 10 and 11 approve the Plan of Adjustment.

PFRS – Scenario A

In the event that both Classes 10 and 11 vote for the POA, with an assumed investment return of 6.75% and a targeted funding rate of 75% in 2023, the POA proposes that PFRS pensioners will receive 100% of their current/accrued pension, but will have their lifetime Cost of Living Adjustments (“COLAs”) reduced by 55%. With COLAs estimated to represent approximately 18% of the total PFRS liabilities, the proposed 55% COLA elimination translates into a 9.9% reduction in estimated PFRS liabilities.

PFRS – Scenario B

If either Classes 10 or 11 vote against the POA, and maintaining the assumed investment return of 6.75% and a targeted funding rate of 75% in 2023, PFRS pensioners will still receive 100% of their current/accrued pension, but their lifetime COLAs will be completely eliminated.

Police and Fire Retirement Systems of the City of Detroit
Projection of Liabilities and Assets
Scenario A
Assuming 55% COLA Reduction, 75% Targeted Funded Status,
and 6.75% Investment Return⁵²

Fiscal Year	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
City-specified Contributions	\$ -	\$ 114.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 18.3	\$ 260.7
Market Value of Assets	\$ 3,071	\$ 3,096	\$ 3,024	\$ 2,946	\$ 2,863	\$ 2,775	\$ 2,681	\$ 2,579	\$ 2,470	\$ 2,354	
Actuarial Accrued Liability	\$ 3,624	\$ 3,573	\$ 3,521	\$ 3,464	\$ 3,404	\$ 3,340	\$ 3,271	\$ 3,198	\$ 3,118	\$ 3,035	
Unfunded Liability	\$ (553)	\$ (477)	\$ (497)	\$ (518)	\$ (541)	\$ (565)	\$ (590)	\$ (619)	\$ (648)	\$ (681)	
Funded Ratio - BOY	86.6%	85.9%	85.0%	84.1%	83.1%	82.0%	80.6%	79.2%	77.6%		
Expected FY Benefit Payments	\$ (285)	\$ (283)	\$ (284)	\$ (284)	\$ (283)	\$ (283)	\$ (284)	\$ (285)	\$ (283)	\$ (283)	\$ (2,554)
Expected FY Admin Expenses	\$ (7)	\$ (7)	\$ (7)	\$ (7)	\$ (7)	\$ (7)	\$ (8)	\$ (8)	\$ (8)	\$ (8)	\$ (66)
Expected FY Net Investment Return	\$ 201	\$ 200	\$ 195	\$ 190	\$ 184	\$ 178	\$ 172	\$ 165	\$ 157		\$ 1,642

⁵² Milliman, Inc. letter, dated April 23, 2014

Fiscal Year	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
<u>Market Value of Assets - Roll Forward</u>											
Market Value of Assets - BOY		\$ 3,071	\$ 3,094	\$ 3,023	\$ 2,945	\$ 2,862	\$ 2,775	\$ 2,681	\$ 2,579	\$ 2,469	\$ 3,071
City-specified Contributions		\$ 114	\$ 18	\$ 18	\$ 18	\$ 18	\$ 18	\$ 18	\$ 18	\$ 18	\$ 261
Expected FY Net Investment Return		\$ 201	\$ 200	\$ 195	\$ 190	\$ 184	\$ 178	\$ 172	\$ 165	\$ 157	\$ 1,642
Expected FY Benefit Payments		\$ (285)	\$ (283)	\$ (284)	\$ (284)	\$ (283)	\$ (283)	\$ (284)	\$ (285)	\$ (283)	\$ (2,554)
Expected FY Admin Expenses		\$ (7)	\$ (7)	\$ (7)	\$ (7)	\$ (7)	\$ (7)	\$ (8)	\$ (8)	\$ (8)	\$ (66)
Market Value of Assets - EOY	\$ 3,071	\$ 3,094	\$ 3,023	\$ 2,945	\$ 2,862	\$ 2,775	\$ 2,681	\$ 2,579	\$ 2,469	\$ 2,354	\$ 2,354
<u>Actuarial Accrued Liability - Roll Forward</u>											
Actuarial Accrued Liability - BOY		\$ 3,624	\$ 3,573	\$ 3,521	\$ 3,464	\$ 3,404	\$ 3,340	\$ 3,271	\$ 3,198	\$ 3,118	\$ 3,624
Expected FY Benefit Payments		\$ (285)	\$ (283)	\$ (284)	\$ (284)	\$ (283)	\$ (283)	\$ (284)	\$ (285)	\$ (283)	\$ (2,554)
Add'l Accrued Liability		\$ 234	\$ 231	\$ 227	\$ 224	\$ 219	\$ 214	\$ 211	\$ 205	\$ 200	\$ 1,965
Actuarial Accrued Liability - EOY	\$ 3,624	\$ 3,573	\$ 3,521	\$ 3,464	\$ 3,404	\$ 3,340	\$ 3,271	\$ 3,198	\$ 3,118	\$ 3,035	\$ 3,035

Plan of Adjustment – GRS (Class 11)

Similar to Class 10, the POA proposes two alternative restructuring scenarios of the GRS pension, with the respective depth of the assumed pension cuts being dependent on whether *both* Classes 10 and 11 approve the Plan of Adjustment.

GRS – Scenario A

In the event that both Classes 10 and 11 vote for the POA, with an assumed investment return of 6.75% and a targeted funding rate of 70% in 2023, GRS pensioners will receive 95.5% of their current/accrued pension, will have their lifetime COLAs eliminated, and pensions will be subjected to a maximum of a 15.5% recoupment of their Annuity Savings Fund excess return⁵³. The combined impact of these proposed changes represents an approximate 27% reduction in

⁵³ Not all GRS retirees will be subject to ASF recoupment; only those retirees who ASF annual return, for FY2004-2013, was greater than the plan assets' actual return up to a maximum recoupment of 15.5% of the pensioner's peak ASF balance

GRS's estimated liabilities comprised of 4.5% from reduced pensions, roughly 9% from the Annuity Savings Fund recoupment, and 14% from the eliminated COLAs.

GRS – Scenario B

If either Classes 10 or 11 vote against the POA, and maintaining the assumed investment return of 6.75% and a targeted funding rate of 70% in 2023, GRS pensioners will receive 73% of their current/accrued pension, will have their lifetime COLAs eliminated, and the ASF recoupment will vary from 0.01% to 100% of a retiree's pension, based upon the excess amount of the pension. The combined impact of these proposed changes represents an approximate 50% in GRS's estimated liabilities comprised of 27% from reduced pensions, roughly 9% from the Annuity Savings Fund recoupment, and 14% from the eliminated COLAs.

General Retirement Systems of the City of Detroit Projection of Liabilities and Assets Scenario A

Assuming 4.5% Benefit Reduction, 100% COLA Reduction, 70% Funded Status, Annuity Savings Fund Recoupment, and 6.75% Investment Return⁵⁴

⁵⁴ Milliman, Inc. letter, dated April 25, 2014

Fiscal Year	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
City-specified Contributions	\$ -	\$ 196.2	\$ 65.3	\$ 65.3	\$ 65.3	\$ 65.3	\$ 65.3	\$ 65.3	\$ 65.3	\$ 65.3	\$ 718.6
Market Value of Assets	\$ 2,027	\$ 2,106	\$ 2,057	\$ 2,005	\$ 1,951	\$ 1,893	\$ 1,831	\$ 1,764	\$ 1,695	\$ 1,622	
Actuarial Accrued Liability	\$ 2,921	\$ 2,866	\$ 2,809	\$ 2,751	\$ 2,688	\$ 2,622	\$ 2,552	\$ 2,477	\$ 2,399	\$ 2,317	
Unfunded Liability	\$ (894)	\$ (760)	\$ (752)	\$ (746)	\$ (737)	\$ (729)	\$ (721)	\$ (713)	\$ (704)	\$ (695)	
Funded Ratio	73.5%	73.2%	72.9%	72.6%	72.2%	71.7%	71.2%	70.7%	70.0%		
Expected FY Benefit Payments	\$ (243)	\$ (241)	\$ (239)	\$ (239)	\$ (239)	\$ (239)	\$ (238)	\$ (238)	\$ (237)	\$ (235)	\$ (2,149)
Expected FY Admin Expenses	\$ (9)	\$ (9)	\$ (10)	\$ (10)	\$ (10)	\$ (10)	\$ (10)	\$ (11)	\$ (11)	\$ (11)	\$ (91)
Expected FY Net Investment Return	\$ 135	\$ 136	\$ 133	\$ 129	\$ 125	\$ 122	\$ 117	\$ 113	\$ 108		\$ 1,118

Fiscal Year	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	10 Year Total
Market Value of Assets - Roll Forward											
Market Value of Assets - BOY	\$ 2,027	\$ 2,106	\$ 2,058	\$ 2,007	\$ 1,952	\$ 1,893	\$ 1,833	\$ 1,766	\$ 1,696	\$ 1,624	\$ 2,027
City-specified Contributions	\$ 196	\$ 65	\$ 65	\$ 65	\$ 65	\$ 65	\$ 65	\$ 65	\$ 65	\$ 65	\$ 719
Expected FY Net Investment Return	\$ 135	\$ 136	\$ 133	\$ 129	\$ 125	\$ 122	\$ 117	\$ 113	\$ 108		\$ 1,118
Expected FY Benefit Payments	\$ (243)	\$ (241)	\$ (239)	\$ (239)	\$ (239)	\$ (239)	\$ (238)	\$ (238)	\$ (237)	\$ (235)	\$ (2,149)
Expected FY Admin Expenses	\$ (9)	\$ (9)	\$ (10)	\$ (10)	\$ (10)	\$ (10)	\$ (11)	\$ (11)	\$ (11)		\$ (91)
Market Value of Assets - EOY	\$ 2,027	\$ 2,106	\$ 2,058	\$ 2,007	\$ 1,952	\$ 1,893	\$ 1,833	\$ 1,766	\$ 1,696	\$ 1,624	\$ 1,624
Actuarial Accrued Liability - Roll Forward											
Actuarial Accrued Liability - BOY	\$ 2,921	\$ 2,866	\$ 2,809	\$ 2,751	\$ 2,688	\$ 2,622	\$ 2,552	\$ 2,477	\$ 2,399		\$ 2,921
Expected FY Benefit Payments	\$ (243)	\$ (241)	\$ (239)	\$ (239)	\$ (239)	\$ (239)	\$ (238)	\$ (238)	\$ (237)	\$ (235)	\$ (2,149)
Add'l Accrued Liability	\$ 188	\$ 184	\$ 181	\$ 176	\$ 173	\$ 168	\$ 163	\$ 159	\$ 153		\$ 1,545
Actuarial Accrued Liability - EOY	\$ 2,921	\$ 2,866	\$ 2,809	\$ 2,751	\$ 2,688	\$ 2,622	\$ 2,552	\$ 2,477	\$ 2,399	\$ 2,317	\$ 2,317

Pension Restoration

The Plan of Adjustment incorporates, for both PFRS and GRS, the potential for previously-reduced pension benefits to be restored if the funding levels of the respective Retirement Systems improve to agreed-upon restoration levels at designated timeframes, the fiscal years ending 2023, 2033, and 2043. These pension restoration payments are designed to be variable, in that, they are only distributed to

the pensioners if the investment performance of the pension plans is at least three percentage points above the targeted funding levels.

The pension restoration thresholds, for both PFRS and GRS, are perpetually three percentage points above each pension plan's targeted funding level throughout the FY2014-2053 time period. If the funding levels exceeds the plan's restoration targeted funding level, i.e. are more than 3 percentage points above the targeted funding level, monies will be allocated to a "restoration reserve account". Once the restoration reserve account equals at least 10% of the lifetime value of the previously-reduced COLA payments, restoration payments will commence in the following year. According to the POA, restoration payments for PFRS will be conditional until 2023, and until 2028 for GRS. If, as a result of the funds' assets subsequently underperforming the targeted investment levels, which would mean that the returns fall below the 3 percentage point threshold for restoration payments, COLA restoration payments are immediately suspended. Beginning in FY2023 for PFRS and FY2028 for GRS, to the degree the plans' funding levels are in excess of the restoration targeted levels, those specific restoration payments become fixed, or "guaranteed", going forward.

It should be clearly understood, in FY2023 (FY2028 for GRS), FY2033 and FY2043, the *maximum* funded level of the GRS and PFRS is the amount shown in the table below. As a result of the negotiations with the parties, the provisions of the

POA relative to the pension settlements ensure that the pension plans at these benchmark dates will never be funded above the restoration funding rate for either the PFRS or GRS plans. If the funding level is above this targeted amount at the benchmark dates, the excess will be swept to a permanent restoration fund such that the funding level will be reduced to the amount shown. In the event that the funding levels at these benchmark dates are below these levels, the City is responsible for this unfunded amount and must fund it in the future. Therefore, as the City considers the average rate of return, it must keep in mind it is “giving away” some of the upside, yet retaining all of the downside.

The following table summarizes both PFRS and GRS’s targeted and pension restoration funding levels for the 2014-2043 timeframe (pension restoration payments cease in 2043)⁵⁵.

	PFRS		GRS	
	Funding Target	Restoration Target	Funding Target	Restoration Target
2014-2023	75%	78%	70%	73%
2024-2033	81%	84%	70%	73%
2034-2043	84%	87%	70%	73%

Impact on Feasibility

⁵⁵ Multiple Milliman, Inc. Pension reports; multiple Phoenix discussions with Jones Day attorneys re: Pension plans

There is considerable debate regarding the selection of the discount rate for calculating liabilities in government sponsored defined benefit (DB) plans. At one end of the debate is the thought that the discount rate of liabilities should equal the expected return on pension assets; at the other end is the thought the liabilities have a very strong contractual and legal requirement and therefore represent a certainty of payment and therefore should be discounted at, or near, the risk free rate. This seemingly academic question has real world consequences when viewing Detroit's POA and its perceived feasibility.

The Nelson A. Rockefeller Institute of Government's recent analysis on this issues - The Blinken Report - dated January 2014, notes⁵⁶:

The problem begins with mismeasurement of liabilities and the cost of funding them securely, for financial reporting purposes. The proper way to value future cash flows such as pension benefit payments is with discount rates that reflect the risk of the payments. This is separate from the question of the rate pension funds will earn on their investments.

This bears repeating: The proper rate for valuing pension liabilities on financial statements is separate from the question of what pension funds will earn on their investments. Different rates may be appropriate for valuing liabilities than for assumed investment returns — and we recommend, later, that different rates be used. The major

⁵⁶ The Blinken Report- Strengthening the Security of Public Sector Defined Benefit Plans, dated January 2014. Donald J Boyd and Peter J Kiernan. *Expert's Note: In the preface of this Report special note is made of the contribution to the analysis and work by Dick Ravitch. Mr. Ravitch is Judge Rhodes' non-testifying consultant in this chapter 9.*

significance of valuing liabilities incorrectly is that it leads to inadequate funding policies, and encourages the mistaken belief that benefits can be greater, services can be greater, or taxes lower while still funding benefits securely. (Blinken Report Emphasis)

Because pensions are promises that should be kept, and have strong legal protections, they should be valued using discount rates that reflect the riskiness of expected benefit payments. Unfortunately, the longstanding practice for public pension plans in the United States, developed before modern financial theory, is to use the expected return on pension fund assets to value liabilities, even though there is no logical connection between how much is owed to workers and what assets will earn. This practice is not used by public pension plans in other countries, or by private plans in the United States, or by economists or financial analysts valuing other cash flows. Our nation's public pension plans stand virtually alone, and recent accounting rule changes by the Governmental Accounting Standards Board (GASB) have not addressed this properly. Rates that reflect the expected risk of benefit payments ordinarily are much lower than the rates public pension funds use to value liabilities, and as a result, public pension liabilities are underestimated by at least \$1-2 trillion, and the annual costs of funding them securely are underestimated by at least \$100-200 billion.

The City of Detroit, in its POA, has used a rate of 6.75% to discount the liabilities of the pension plans. This rate is lower than the historical rates that PFRS and GRS have previously used and lower than recent investment returns, although recent market returns are heavily impacted by the recovery from the Great Recession. It is also low relative to peers (see previous chart on comparison of Assumed Investment Returns of comparable public plans). In fact, there are few other major government sponsored plans that use a lower rate to discount the liabilities in their pension plans. On the surface, this appears to be a conservative

assumption. However, I am not convinced that the City appreciates the opportunity it has to provide stewardship in this area. Highlighting that the City's assumptions are low relative to history, a history that got them to this place, and low relative to their peers - peers who collectively may be underfunded by \$2 trillion or more, is not much consolation.⁵⁷

We believe that the selection of a discount rate has relevance as to the feasibility of the Detroit POA, in that, in the future without the benefit to change pension obligations, pension funding requirements become a de facto first priority on cash flows. This results in crowding out other cash flow priorities. The City must be continually be mindful that a root cause of the financial troubles it now experiences is the failure to properly address future pension obligations. Below we address two main concerns regarding the selection of the discount rate for valuing future liabilities in the Plan.

The investment return at 6.75% appears to be based on future investment returns. This rate clearly reflects a rate above the current risk free rate of return and therefore indicates a level of assumed volatility and risk. The argument for using a discount rate that is related to investment returns typically states that using a rate

⁵⁷ Blinken Executive Summary pg. vii.

that is higher than the risk free rate is acceptable due to the long “runway” of a municipal pension. The argument goes: a municipal entity differs from an individual in that, as an individual ages, they typically must moderate their investment behavior towards lower risk investments due to shortening time horizons and, therefore, often lock in losses in down markets. The argument continues: the long time horizon of a municipal pension plan allows it to avoid this phenomenon. Of course, pension plans are not able to defer plan payments during down markets, and therefore, in significant down markets, the loss of principal as a result of making payments to pensioners, without offsetting investment returns, can result in a plan that “locks in” losses. These “locked in” losses create underfunding.

Further, the current POA contemplates Pension Restoration provisions. These provisions essentially allow pension plan beneficiaries to have some opportunity for restoration of lost pension benefits. Post confirmation, until June 2023 for PFRS and June 2028 for GRS, if the pension plans exceed 78% for PFRS or 73% for GRS, despite still being underfunded nearly 22% and 27%, respectively, additional funds can be set aside into a pension restoration fund. The funding levels and the ability of beneficiaries to receive restoration benefits are limited to actuarial and investment return adjustments and not to additional city contributions. However, under this plan, the City can be underfunded in FY2043 and still be in the mode of restoring pension benefits to then existing retirees. Based on the settlement terms and the

assumptions made, there does not appear to be recognition that a pension plan, someday, will need to be 100% funded. The City appears to adopt an institutional philosophy of underfunding.

On top of the conceptual argument that funding targets should be set at no less than 100%, before additional commitments are made to increase benefits, a larger concern exists. The City's assumption of a 6.75% rate of return implicitly requires the City to accept risk and volatility. Volatility is, of course, a positive and a negative force. At times, the City should be expected to achieve returns above 6.75% and, at times, the City should expect returns below this level. Over the past 10 years, the Retirement Systems have seen significant variations in their investment returns both above and below the average return. Again, this is the argument for municipal pensions to use investment returns because over the long term, there should be smoothing. Because the City's defined benefit plans are essentially in runoff, they will inevitably experience declining asset levels. In this environment of declining assets and volatility, returns over time are not equally weighted.

Thus, order matters when returns are volatile. It is much better to receive high returns early and low returns later, even though both streams provide the same simple average growth rate. Examples of the impact of timing on returns in a given 10-year period are detailed in the Sensitivity section below. This is not a trivial

issue, even though it is quite technical. As pension funds mature and net outflows increase, asset values will be more volatile and more susceptible to the order in which returns occur. In an environment in which expected returns are low in the short term — as the current low-interest-rate, low-inflation environment may be — funds cannot simply balance low returns in the short term with high returns later; they will need much higher returns later because investible assets will be lower than they otherwise would have been.⁵⁸

As example from the Blinken report: *Blinken Report Footnote #96*

Consider a pension fund that has net outflows equal to 4.5 percent of assets, with benefits and contributions both growing 7 percent annually (roughly consistent with recent experience). If it earns 4 percent on investments for five years, followed by 12 percent for five years, its assets at the end of ten years will be nearly 13 percent lower than if the returns come in the opposite order, even though annual average return is 7.9 percent either way. $[(1.04^{10} \times 1.12^{10}) - 1 = (1.12^{10} \times 1.04^{10}) - 1 = 7.93\%$.] If the fund earns 4 percent for ten years followed by ten years of 12 percent, its assets after twenty years would be 90 percent less than if returns had come in the opposite order. These calculations assume no change in contributions to amortize asset shortfalls in the early years. Amortization would narrow the difference between the two sequences of returns.

⁵⁸ Blinken pg 25.

Further exacerbating this issue, the City is agreeing to give up part, or maybe all, of its upside investment returns by virtue of the pension restoration benefits, but it is retaining all of the downside risk. If the funds' assets participate in a bull market in the first ten years of the POA, and the pension plans move to a funded level of 88%, the City would provide significant restoration benefits. If this bull market was then followed by a five year bear market, all of the restoration benefits paid during the bull market would serve to exacerbate the unfunded level of the pension plans and the City could be responsible for considerable funding risk.

It appears that the combination of a need to continue to invest in assets with risk and volatility in order to achieve investment returns and the restoration benefit to the pensioners, even at a level of low plan funding, acts as a one sided collar. That is, the City gives away much of the upside in investment earnings, while retaining all of the downside investment risk.

Legality of POA's Proposed Pension Cuts

Numerous parties in this bankruptcy, namely employees, retirees, Retirement Systems, and certain labor unions, have argued that the City is not legally able to

impair accrued pension benefits as they are protected under Article IX, Section 24 of the Michigan State Constitution of 1963. These same groups were granted permission to appeal the Bankruptcy Court's eligibility ruling to the U.S. Court of Appeals for the Sixth Circuit. To the degree that these parties are successful in their appeal of the Bankruptcy Court's eligibility ruling, the City's chapter 9 could be dismissed or may be unable to effectuate reductions in accrued vested pension benefits.

Sensitivity Analysis

The Society of Actuaries issued a *Report of the Blue Ribbon Panel on Public Pension Funding* in February 2014. The Blue Ribbon Panel recommended stress tests measuring the effect of investment returns over a 20-year period that are three percentage points above and below those used in calculating standardized plan contributions⁵⁹. The panel believes that +/- 3% points represents "plausible stresses" based on its review of prior market returns⁶⁰.

⁵⁹ The Society of Actuaries "Report of the Blue Ribbon Panel on Public Pension Plan Funding"; February 2014

⁶⁰ The Society of Actuaries "Report of the Blue Ribbon Panel on Public Pension Plan Funding"; February 2014

In response to my request for a sensitivity analysis for the pension plans assuming various average rates of return for the FY2014-2023 period and the aforementioned scenarios of 1) a bear market 5-year period followed by a bull market 5-year period and 2) a bull market 5-year period followed by a bear market 5-year period, the City's actuary has analyzed the PFRS plan.

As illustrated below, if the PFRS plan averages a 6% rate of return (75 basis points lower than the assumed rate of return) over the nine years ending June 2023, the plan is forecasted to be only 70% funded in June 2023, resulting in an additional \$236 million of unfunded liability versus the POA projections. That unfunded variance expands to \$527 million if the PFRS plan averages a 5% rate of return during this time period. Finally, if PFRS is negatively impacted by a bear market/bull market cycle (as opposed to the inverse) with five years averaging 0% followed by five years averaging 10%, the pension plan would have \$342 million more in unfunded liabilities during the 10-year period in question.

PFRS Average Rate of Return Scenario Analysis⁶¹

Average Rates of Return July 2014 - June 2023	Estimated Funding Status June 2023	Estimated Projected Unfunded Liability June 2023	Estimated Projected Unfunded Liability Variance
3.00%	43%	\$ 1,717	\$ 1,036
5.00%	60%	\$ 1,208	\$ 527
6.00%	70%	\$ 917	\$ 236
6.75%	78%	\$ 681	\$ -
8.00%	92%	\$ 252	\$ (429)
0% - 1st 5 years; 10% - 2nd five years	53%	\$ 1,439	\$ 758
10% - 1st 5 years; 0% - 2nd five years	64%	\$ 1,097	\$ 416

We have requested sensitivity analysis for GRS consistent with the PFRS sensitivity analysis highlighted above. At the time of this Report's release, we have not been provided the GRS sensitivity analysis.

Recommendations on Reporting Requirements

The City of Detroit will be bound by numerous reporting requirements and financial oversight when it emerges from bankruptcy. Going forward, these intended protocols are designed to assist the City in managing its cash flow and liquidity relative to its POA commitments and its future budgets. In addition, it will be important for the City to report its financial condition to various constituencies on a regular basis.

⁶¹ Milliman, Inc. letter; dated July 9, 2014

Timely, accurate financial reporting relating to the City's pension plans will be an essential tool as the retirement systems manage the plans' assets and liabilities and make critical decisions regarding future estimated rates of returns and annual funding requirements. At the end of June 2012, the Governmental Accounting Standards Board ("GASB") issued standards intended to reform how state and local governments report the financial status of their pension funds and how they finance them. GASB 67 defines how government pension funds must report finances related to pension activities. GASB 68 pertains to state and local government reporting of activities associated with pension finances.⁶² Both GASB standards are effective in FY2015 and will enhance the City's financial disclosures relating to its pension plans.

As the asset features and credit quality of the pension plans' investments evolve over time, so, too, will the reporting corresponding to those investments. The City's pension plans should establish a baseline level of financial reporting that will be accurate and illustrative of the condition of the pension plans at any point in time. The Society of Actuaries' report recommended that actuarial funding reports should contain, for at least the previous ten years, information presenting the relationship of benefit payments, funding liabilities, and assets to payroll; the relationship

⁶² Governmental Accounting Standards Board

between the recommended contribution to payroll and to the sponsor's budget or revenue source; and the ratio of contributions made to the total recommended contribution.⁶³

Additionally, to understand current risk levels, three benchmarks should be disclosed:

- 1) The expected standard deviation of investment returns of the asset portfolio on the report date;
- 2) The plan liability and normal cost calculated at the risk-free rate, which estimates the investment risk being taken in the investment earnings assumption; and
- 3) A standardized plan contribution for assessing the aggregate risks to the adequacy of the recommended contribution.⁶⁴

Further, we recommend that the City disclose the gross liability and the UAAL by year on an undiscounted basis. This will allow third parties a better understanding of the changes in the liabilities from year to year.

⁶³ The Society of Actuaries "Report of the Blue Ribbon Panel on Public Pension Plan Funding"; February 2014

⁶⁴ The Society of Actuaries "Report of the Blue Ribbon Panel on Public Pension Plan Funding"; February 2014

Section K - Human Capital and Leadership

Detroit's fifty year decline was caused by changing demographics, economics and the failure of elected officials to respond effectively. The downward spiral finally resulted in the City filing for Bankruptcy. Beyond the financial crises, the City has suffered from a deterioration of the efficiency and effectiveness of its City's workforce, as measured by the cost of service delivery versus the benefit the citizens received from those services.⁶⁵ Inadequate investment in human capital and poor leadership during the decline served to exacerbate the situation.

At its core, this chapter 9 is a fundamental change project. The City, through the guidance of its bankruptcy advisors, has fundamentally changed the City's balance sheet and reduced its long term obligations. The Emergency Manager has begun the even harder task of reshaping the operations of the City for the benefit of the taxpayers. The Mayor, and other elected and appointed officials, will need to continue this part of the change project. Human capital and leadership are two of

⁶⁵ Docket # 14, page 29 of 106, Memorandum in Support of Statement of Qualifications Pursuant to Section 109 (c) of the Bankruptcy Code

the most important components to any successful restructuring⁶⁶. I believe the success, or failure, of Detroit's revitalization will hinge on the people employed by the City and the officials elected by the residents in the coming years. The skill level, on average, of City workers is low and outdated. Civil service requirements and historical collective bargaining agreements work against a merit or performance based employment culture in most municipalities and Detroit is no exception. Lack of even modest technology and up-to-date systems, as is the case with the City, ensure that employees will not perform at competitive levels to their peers in the private sector or even in municipalities that are efficient.

Impact on Feasibility

As I noted in my definition of feasibility, the second assessment prong of feasibility is "will and skill". Leadership, political and intestinal fortitude define "will" and talent and training equate to "skill".

For example, in order to arrest the downward trend of revenue, City employees must do a better job of collecting the taxes and fees that are currently due – that is skill. Better systems and more experienced management will be required

⁶⁶ I have written on this topic previously. See American Bankruptcy Journal, March 2014, "The Missing Link to Successful Company Turnarounds – Balance Sheet Management is Only Part of the Story"

to accomplish that goal. It was evident to me and my team that there are City employees who are knowledgeable, have good ideas about improving the operations and want to learn and advance. There are also employees who don't grasp that their job is to provide a service to the taxpayers versus the taxpayers owing them a job. This is a cultural malady that will have to change if Detroit is to be successful. Leadership that is focused on outcomes of service delivery and operating efficiency will be required, as will standards for personal and departmental performance.

Current Workforce Issues

The City employs more than 9,000 people and as a result of the RRI expects add to almost 700 net new positions. After accounting for attrition, this is a significant mobilization. Further, my discussions with the leaders in the City indicate a universal understanding that increasing the average talent base of the employees is a cornerstone for success of the Plan and the City. This topic was acknowledged at the outset of the case and continues to present challenges to the City's management team. Throughout my team's discussions with City leaders and department managers, the issue of human resources has been a regular topic of discussion.

Throughout our discussion in the finance and accounting functions it has been noted:

“Many qualified and experienced employees have left their jobs over concerns about the long term prospects of their positions; Difficulty in replacing employees with qualified personnel because salary structure is no longer reasonable and competitive. This weakness has been partially mitigated by hiring employees outside the official system using Professional Service Contracts (PSC’s), consultants and contractors.”

Exacerbating the problem of historic skill level are the changes made to compensation prior to, and as a result of, the bankruptcy. Prior to the Bankruptcy,

*“the City has also implemented a 10% reduction in the wages to majority of the workforce in the addition to furlough days of 10% to a majority of the non-uniform employees. Medical and prescription drug plan designs have been changed to reduce the costs associated with healthcare and increase the percentage of contributions from active employees.”*⁶⁷

The POA eliminates future accrual of the defined benefit retirement plan and replaces with what is arguably a less generous hybrid pension plan. The Plan eliminates certain OPEB benefits, specifically, post-retirement healthcare and replaces with what is arguably a less generous VEBA plan.

Beth Niblock, the City’s CIO, noted this concern in her Expert Report, *“(a)ttracting and maintaining a highly skilled workforce is a challenging task,*

⁶⁷ Declaration of Gaurav Malhotra in Support of the City of Detroit, Michigan’s Statement of Qualifications Pursuant to Section 109 (c) of the Bankruptcy Code

particularly given the current and proposed compensation rates set forth in the Projections.”⁶⁸

There is little doubt that total compensation includes not only direct pay, but the benefits conferred to employees in the current time frame plus those that are expected to be conferred to the employee in the future. Individuals may possess differing views as to relative value of each category of pay; however, they do place some value on the deferred benefits.⁶⁹ With all of these changes to compensation, it is unclear what the impact will be on retention and recruitment. While there are studies to suggest, and perhaps some experience in Detroit to confirm, that the elimination of post-retirement healthcare may offset the impact of the pension changes as a retention tool. Current employees, when they retire, will not have the benefit of receiving healthcare benefits prior to Medicare eligibility. Therefore, employees may be more likely to stay in their positions with the City.

While the specific impact of the compensation changes on retention is unknown at this time, the impact on current employees and future employees may be different. For current City employees, the City has necessarily lowered the

⁶⁸ Report of Beth Niblock, Chief Information Officer for the City of Detroit-Expert report submitted in support of the City’s POA – page 15.

⁶⁹Are Public Pensions Keeping up with the Times? Richard W. Johnson, Mathew Chingos and Grover Whitehurst page 47.”

overall economic value of City employment and changed the perception of the long term value in having worked for the City, once an employee leaves or retires. For future employees the economic and long term value analysis will be based on the individual's perception of alternative employment opportunities. The City is currently working with the consulting firm of Fox Lawson to complete a compensation review so that the City may have more than anecdotal evidence as it proceeds with the recruitment and staffing. We understand that the results of this study are not available and therefore were not considered when the City developed the POA projections.

In addition, the City has acknowledged the issue of skill development by including in the RRI's significant funding for employee training. The City has included an annual employee training budget of \$2,000 for each non-uniformed employee through 2017 and \$1,500 per year thereafter. The total RRI allocation to training over a 10 year period is \$54.4 million. While no actual allocation of training dollars has been made, I believe that this is a strong indicator of the City's commitment to helping its current employees develop the skills they need to contribute to the success of the City and to maintain competitive skills within its employee base.

Throughout our meetings with City leaders and the advisors to the City, it has been noted that if compensation is a barrier to hiring the skilled talent required, the

City will likely adapt to this by hiring fewer but more skilled employees. I believe this approach can partially mitigate feasibility concerns regarding the City's ability to implement the Plan. Presently, the City is squeezed from both sides of the labor market: in order to do even the simplest routine task, the City has hired consultants yet maintains full time employees who should be able to manage those tasks but are not sufficiently trained to do so.

A significant challenge to acquiring the talent the City so desperately needs is the state of the Human Resources department. The Human Resources department is in need of an overhaul – recently, it has taken over six months to hire a new employee for an approved opening. As a result, department heads “work around” the department and find ways to recruit and hire employees more efficiently. The Mayor is well aware of the need for leadership in this key area.

Given the large number of recruits envisioned in the POA, a new approach to talent acquisition is needed. Consultants are in place to assess the skills needed to revamp key departments such as accounting and IT and the current leadership of those departments is experienced and capable. In fact, many of the Mayor's direct reports are experienced operational managers with successful employment histories. Overhauling the human resource function will be critical to a successful restructuring.

Leadership and Cultural Change

If the City is to counteract the vortex of underachievement that has defined Detroit, City leadership must make a long term, concerted effort to maintain the momentum needed to ensure effective City services. The Emergency Manager has made progress on the macro changes required and I believe the Mayor is developing a culture based on performance metrics and accountability and some of the *status quo* is going by the wayside.

I have confidence in Mayor Duggan. My opinion of feasibility is favorably influenced by my view of Mayor Duggan as a leader and an operational executive. I am encouraged by the manner in which he leads many of the City's departments given the real power is still held by the Emergency Manager. The Mayor has created simple metrics around which he can measure the performance of his department heads daily and/or weekly. This is a commendable workaround as the accounting and information systems, as noted elsewhere, are abysmal. While ultimately the City will need to address the core reporting system, the use of this simplistic metrics based approach is effective and understandable. When one is at the vortex of underachievement, having a few very simple and actionable goals can make a huge difference in the overall performance of the organizations. Having periodically attended the Mayor's Cabinet meetings, I know that if ambulance response times do

not decrease more rapidly, it will be evident to all and managers will be held accountable; this level of accountability can change the City for the better.

In the long term, the City's leadership is subject to the democratic process. There is clearly risk that future elected leaders stray from principals in the POA, but I am choosing to rely upon the combination of the electoral process and the oversight function implemented as part of the Grand Bargain legislation to keep future City leaders focused on strong stewardship.

Collective Bargaining Agreements

My team has not been privy to the negotiations between the City and its unions, or the resulting term sheets. The City's financial advisors have indicated that the economic issues addressed in the collective bargaining agreements ("CBAs") negotiated during the bankruptcy have been appropriately included in the POA projections. Based on discussions with long standing and former City officials and employees, I believe the more significant workforce issues are centered on the restrictive work rule provisions that have caused labor inefficiency, higher costs and inability to change outdated processes. I do not know if, or to what extent, any of these issues have been addressed in the recently negotiated CBAs. While I believe that the Emergency Manager's desire to negotiate 5 year contracts has been beneficial in mitigating the risk associated with adverse arbitration awards in the

future, I remain concerned that the City has missed an opportunity to make long term changes in its business processes and ability to manage through unforeseen events.

Section L - Blight

Detroit's Blight History

The City of Detroit, due to its shrinking population⁷⁰, depressed economy, and sagging property values, has experienced a metastasizing urban blight condition over the past several decades. Depending on which statistics are referenced, this City of approximately 139 square miles contains roughly 380,000 land parcels, of which 84,000 parcels (or 22%) have been identified as currently exhibiting blight characteristics or having indicators of future blight.⁷¹ These blighted parcels are geographically disbursed throughout the City, resulting in a ripple effect throughout most neighborhoods which further stretch the City's limited resources. An expanding blight crisis within Detroit is not just a land and property issue; rather, this epidemic has an exponential impact on the City's efforts with regards to public

⁷⁰From roughly 1.8 million residents in the 1950's to the current estimate of under 700,000

⁷¹ Every Neighborhood Has A Future... And it Doesn't Include Blight, Detroit Blight Removal Task Force Plan May 2014. Page 15

safety, education, job growth, property tax revenue, and the City's efforts to attract new residents and businesses.

As recently as 2010, under Mayor Bing's administration, the City of Detroit began a coordinated effort to tackle the City's growing urban blight, with an initial goal of razing 10,000 vacant structures, roughly 13% of the vacant structures within the City, at that time. The City reached approximately 50% of its stated blight removal goal by 2013, but lacked the necessary funding to continue its targeted efforts. Demolition expense estimates for blighted residential structures have ranged between \$8,500 - \$12,000 per structure, depending on the size of the building and the degree of blight and neglect. In addition to the incremental costs, the City's protracted payments to the demolition contractors have resulted in reducing the number of contractors willing to provide demolition services.

Current Blight Initiatives

Mayor Duggan has made blight eradication a top priority and has attempted to coordinate Detroit's multiple public and private organizations in an effort to streamline funding and execute a strategy toward this critical effort. To that end, the Duggan administration has created the Department of Neighborhoods and

empowered the Detroit Land Bank Authority (“DLBA”) to aggressively move forward with multiple blight initiatives, including:

- Nuisance Abatement
 - Legal process of the City taking proactive legal remedies to seize abandoned properties within Detroit via the transfer of title to the DLBA (after the owner has been given the opportunity to bring the property “up to code”)
- Enhanced Intake Process
 - DLBA performs a cost-benefit analysis to assess the estimated costs to restore a property as compared the assumed demolition expense
- Disposition
 - DLBA has been initially successful in selling viable houses via open houses and online auctions

In addition to the City’s blight efforts, the Detroit Blight Removal Task Force (“Task Force”) recently released its Blight Removal Task Force Plan that articulated the Task Force’s efforts since it was founded in September 2013 and its view on the City’s blight efforts. The Task Force, in partnership with Data Driven Detroit and Michigan Nonprofit Association, created the Motor City Mapping (“MCM”) project that created a database cataloging the physical condition, tax status, and other pertinent information of all 380,000 parcels of land in Detroit. Also, these partners developed the Maximizing Community Impact (“MCI”) software tool designed to identify neighborhoods where targeted funding could stem blight expansion. Going forward, the Task Force’s mission – as it pertains to the City’s blight – is to focus on removing blighted structures and cleaning vacant parcels. The Task Force

estimates it will cost the City approximately \$850 million to execute the Task Force's demolition strategy⁷².

While the City's blight action plan and the Task Force's recommendation appear to be directionally aligned, the City's overall mission to stabilize neighborhoods may result in the DLBA pursuing deconstruction efforts in lieu of demolition, where it makes more sense. If the DLBA is able to resell or recycle some of the building components of the blighted structures and create valuable job opportunities in the process, that approach may make better fiscal sense than an across-the-board demolition strategy.

Plan of Adjustment – Blight Proposals

The City's POA includes a Blight Reinvestment Initiative that proposes to allocate \$420 million of funding towards blight removal over the course of the next nine years. The projected funds dedicated for blight removal have changed in each iteration of the City's POA projections and funding has been allocated to other POA obligations. The forecasted annual blight RRI is as follows:

⁷² Every Neighborhood Has A Future... And it Doesn't Include Blight, Detroit Blight Removal Task Force Plan May 2014.

(\$ millions)

City of Detroit's POA Proposed Blight Expenditures

Fiscal Year	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	Total
Blight Expenditures	\$ 2	\$ 100	\$ 46	\$ 40	\$ 43	\$ 48	\$ 52	\$ 45	\$ 25	\$ 19	\$ 420

Funding for the intended blight removal efforts is forecasted to come from a variety of public and private sources, namely \$52 million from the federal government's allocation of its Hardest Hit fund, \$20 million from the Fire Escrow fund⁷³, various private sector contributions, with the balance coming from the City's annual cash flow. I have been told that the funding source for blight is flexible and is currently not necessarily dedicated only for this purpose. The Exit Financing contemplated appears to be the primary source for this funding.

Assuming the City can generate, or raise, the entire \$420 million dedicated for Blight removal over the next nine years, at an average demolition expense of \$11,000 per structure⁷⁴, the POA only allocates enough funding to remove about 50% of the structures designated by the Task Force blight removal.

⁷³It is not clear how the City intends to access these funds for its general blight initiative, as we understand the funds in escrow are designated for the demolition of particular properties destroyed by fire.

⁷⁴Phoenix assumed an average demolition expense of \$11,000 per structure, within the \$8,500-\$12,000 range proffered in the Disclosure Statement and in Phoenix's conversations with the DLBA.

I am not troubled by this apparent discrepancy between what the Task Force believes is required to eradicate blight and what the City is proposing. At some point during the next ten year period, assuming the City can dedicate sufficient funding to the blight initiative in the next few years, I believe that blight removal can become more self-sustaining by incorporating private capital or cost neutral solutions. If the City is initially successful in its blight remediation efforts, private owners and investors will see an economic opportunity to allocate private capital to take advantage of the revitalization efforts. It should be noted that, of the 79,000 structures (excluding lots) that are included as blighted or indicating blight, almost half have the lesser designation of ‘structures with indicators of future blight’.⁷⁵ It is likely that some portion of these structures might create realistic opportunity for private investors.⁷⁶

⁷⁵Every Neighborhood Has A Future... And it Doesn't Include Blight, Detroit Blight Removal Task Force Plan May 2014. Page 15

⁷⁶Every Neighborhood Has A Future... And it Doesn't Include Blight, Detroit Blight Removal Task Force Plan May 2014. Page 224- the Blight task force estimates that 80-90% of the properties with blight indicators marked for ‘further analysis’ will eventually require demolition.

Blight Summary

Quantifying the near- and long-term economic impact of a successful City of Detroit blight removal initiative is difficult due to the absence of a calculable immediate return on the City's investment. The City's POA forecast, embedding the positive cash flow impact of the proposed RRIs, assumes increased income tax revenues of \$204 million and property tax revenues of \$110 million in the ten year period ending June 2023. While other RRIs impact the reasonableness of these incremental revenue assumptions, the relative impact of the blight removal initiative cannot be overstated.

In order to maximize the benefits of the blight removal program, the City must ensure that the funding is committed and supported in the longer term. For better or worse, blight has an emotional impact on the perception of what Detroit is and can be. I believe that the blight initiatives are immensely important to creating and sustaining a positive trajectory for the City's revitalization efforts. With substantive, long term commitments to address blight, I believe that many of the external factors, including home ownership and job creation required to abate the City's decline, can be addressed. Conversely, a start and stop approach, will likely result in ineffective investment and do little to reverse the spread of blight throughout Detroit. This trend would ultimately constrict the City's liquidity and make Detroit a less desirous

location for new residents and employers. To effectively address blight, the City needs to achieve economies of scale. The Task Force estimates that through economies of scale, the average cost per structure may be reduced by 17%. Put differently, with proper planning and investment, the City's blight investment can produce 17% greater impact for the same money.⁷⁷

Finally, continued coordination between the City, the State of Michigan, the Federal government, DLBA, and various private constituencies will be critical to the long-term success of the blight initiative. Perpetual updating of MCM, and effective utilization of the MCI software tool to identify the neighborhoods that will benefit the most from allocation of the limited blight funding, will be important to the success of this most critical City initiative.

⁷⁷ Every Neighborhood Has A Future... And it Doesn't Include Blight, Detroit Blight Removal Task Force Plan May 2014. Page 224

Section M – Post Confirmation Oversight

As noted in my definition of feasibility, I believe that the determination of feasibility stretches far into the future, although to impact feasibility, issues that extend further into time must be more significant. Beyond the strictly financial issues, one of the most significant issues impacting feasibility involves post confirmation oversight and governance. Ultimately, the City of Detroit will be largely run by an elected mayor and an elected city council. There are obvious inherent limitations to understanding how the City will be run without knowing who will occupy these critical positions. In the end, the success of the POA will largely rest on the will of these elected officials and whether the will to make the fundamental change is inherited by future leaders.

While the democratic process necessarily creates this limitation, the State of Michigan has created a framework that will provide a level of consistent oversight for the City. If implemented correctly, this oversight will institute financial accountability in the City's operations and greatly improve the ability to address small problems before they become significant factors to long term viability.

Public Act 181 of 2014 establishes a 9 member commission, the Financial Review Commission (FRC), with fairly broad oversight power over the City.

Powers to be granted to the FRC include:

- Ensure the City is complying with the POA
- Review and approve the City's consensus revenue
- Require the City to submit 4 year financial plans
- Review, approve and modify proposed and amended operational budgets of the City
- Require relevant information from the City
- Review and approve requests by the City to issue debt
- Approve the appointment and termination of the City's CFO
- Approve collective bargaining agreements
- Approve all contracts that exceed \$750,000

I strongly believe that the appointment of the FRC improves the prospect of the City continuing to improve its fiscal health and therefore, provides some level of assurance to me regarding feasibility. I do note, that the FRC is populated by 9 non-compensated members. What we have learned about the City's finances, reporting and operations compels me to caution that the task the FRC is undertaking is not only challenging, but will require substantial time. Therefore, I believe that the positive prospects associated with the implementation of the FRC would be improved if the FRC hires permanent staff. My belief is that an executive director level professional with qualifications similar to a CFO would significantly improve the oversight functions associated with the FRC. I understand that the State has

appropriated funds for the operation of the FRC and these funds may in fact already be allocated to the above noted purpose.

As noted elsewhere in this Report, the pension plans are very complex. The accounting and actuarial assumptions are difficult to understand; it is even harder to understand how changes in assumptions may changes the City's future financial prospects. Therefore, I believe that it is important for the FRC to require annualized reporting from the City regarding each of the GRS and PFRS systems:

- The undiscounted liability of each of its pension plans.
- A sensitivity analysis consistent with those recommended by the Society of Actuaries Blue Ribbon Panel that provide a discount of the liability based on +/- 3% from the investment return discount rate used in the plan.

This reporting will allow outside observers to truly understand the nature of the City's continuing legacy pension obligations and insure that the City has foresight to deal with and significant deterioration of the pension UAAL during the time in which the City will not be making any direct cash payments to the pension funds, but the liability could nonetheless grow.

Public Act 182 of 2014 provides for the appointment of the City CFO, the identification of reporting requirements to the FRC and others, among other provisions. We do note that Public Act 181 and 182 requires the following:

That the City's financial plan include a general reserve fund for each fiscal year to cover potential reductions in revenues or increases in projected expenditures equal to not less than 5% of the project expenditures for the fiscal year.

I do not believe that the City's POA, as currently presented, complies with this requirement. The City has not identified how it intends to come into compliance with this provision.

As noted elsewhere in my Report, the City is unable to produce any reliable reporting in a timely manner. This will impact the FRC in their duties. At present, the City does not conduct monthly financial closes. That is, the City does not produce financial statements during the year. Further, it does not have a system to properly account for encumbrances. At present, the City relies on cash based information for what little information it does use to manage its operations. This cash based system is woefully inadequate for the purpose of running a major city long term. This will be compounded as the City begins to make large scale investments, such as blight remediation, which require the allocation of funding well in advance of the actual cash expenditure. The City has targeted an ERP system as one of its highest priorities in the RRI's. We fully support this initiative. However, it typically requires between 2-3 years, and sometimes even longer, for a full ERP implementation. During this time, the City will be required to continue to rely on ad hoc reporting. It is my observation that Mayor Duggan is using ad hoc operational

metrics to gain visibility. Given the lack of alternative options, I applaud this and believe that this can be a reasonable proxy for the immediate term, but it cannot replace the need for quick, integrated, systematic reporting over a longer period.

I have a significant concern regarding the City's intention with regard to the ad hoc reporting currently performed. It is my belief, the City is relying heavily on the cash team on site from E&Y. I understand that 3 full time E&Y personnel are allocated exclusively to cash management and reporting. I further understand that the POA does not have any direct funding allocated to retaining E&Y for this function. Further, I do not believe the City has recruited and trained personnel for this fairly complex and critical role. Failure to address this issue prior to confirmation could have a significant impact on the City's ability to manage cash and provide any level of reporting.

Section N - City of Detroit Unresolved Issues

In the event that the Plan of Adjustment is confirmed, the City of Detroit will continue to be challenged with operational, legal and financial issues critical to the City's long-term viability and its ability to execute the proposed restructuring initiatives, including:

- Bankruptcy Eligibility
- 2005-2006 Certificates of Participation
- Potential Swap litigation
- Impact of Collective Bargaining Agreements negotiations
- Potential City of Detroit Asset Sales
- Exit Financing
- Professional Fees post-bankruptcy

The immediate and long-term impacts to the City if it ultimately receives negative outcomes from any of these key issues cannot be quantified at this time. It is likely, though, that these (and possibly other) issues, both individually and collectively, will consume significant City resources, with regards to both human capital and financial reserves, in the period immediately following the conclusion of these chapter 9 proceedings.

Chapter 9 Eligibility

The central issue before the Court since the beginning of this municipal bankruptcy has been the ultimate determination as to whether the City of Detroit was eligible to be a debtor under chapter 9 of the Bankruptcy Code. At the petition date, the City filed its Statement of Qualifications and supporting memorandum demonstrating its compliance with the chapter 9 debtor requirements. Approximately 110 objections to the City's eligibility were filed, along with the Attorney General for the State of Michigan's argument that the Pension Clause of the Michigan Constitution prohibited the City from impairing its obligations to the City's pensioners.

After three months of multiple hearings and bench trial, on December 5, 2013, the Court entered the Eligibility Order stipulating that the City was eligible to be a debtor under chapter 9 and that its bankruptcy petition was filed in good faith. The objecting parties immediately requested an Order of Relief to the Sixth Circuit Court of Appeals. The Bankruptcy Court subsequently issued a memorandum recommending that the Sixth Circuit deny the appeal request entirely, and, if the Sixth Circuit did grant the appeal, that the appeal should not be expedited and therefore ruled upon prior to the City's Confirmation hearing. On February 21,

2014, the Sixth Circuit Court of Appeals granted the appeal petitions, but stated that the appeals would not be expedited.

At this juncture, the City's bankruptcy confirmation hearing and ultimate resolution is scheduled to occur prior to the Sixth Circuit's appellate hearing and decision. The potential impact of a reversal or modification of the Court's Eligibility Order is unknown at this time. It is conceivable that a reversal of the Bankruptcy Court's Eligibility ruling would completely negate the negotiated advances the City has made to date, specifically relating to employee compensation and pension/benefits reform.

Certificates of Participation

In 2005 and 2006, the City of Detroit, via its Retirement Systems and their related service corporations, issued multiple debt instruments known as certificates of participation ("COPs") totaling \$1.47 billion in an effort to reduce the pension plans' combined unfunded liability. At the petition date, three series of COPs were outstanding totaling \$1.473 billion:

(\$ million)	Amount	Interest
COP Series	Outstanding	Rate
2005-A	\$ 517.6	4.5-4.95%
2006-A	\$ 153.7	5.989%
2006-B	\$ 801.6	Floating
	\$ 1,472.9	

Material legal debate currently exists as to whether the City of Detroit was legally able to issue the COP debt instruments. The City is bound by both the Home Rule City Act, which details the level of indebtedness a city may incur, and the Municipal Finance Act, which prohibits a city from issuing a municipal security except in accordance with provisions of the Municipal Finance Act. The 2005-2006 COP debt instruments may have been in violation of either or both of these legal statutes.

On January 31, 2014, the City filed a complaint against the Service Corporations and the Funding Trusts – the non-profit entities established to effect the COP debt issuances – stating the 2005-2006 debt issuances were in violation of state law and that the related COP claims should be disallowed in the chapter 9 proceedings. Contradictory complaints were subsequently filed by the Funding Trusts, COP holders, and the COP insurers citing multiple affirmative defenses to the City’s complaint. At this time, hearings on the respective motions have been adjourned indefinitely. To the degree that such legal proceedings result in the COP

claims being fully or partially allowed, the City's POA could be materially weakened, and may result in incremental liquidity being required from future tax revenue to satisfy future obligations.

Potential Swap Litigation

As highlighted above, the City previously issued multiple COP debt issuances, the 2006-B series of which contained variable interest rates, thereby exposing the City to a rising interest rate environment. To hedge against this risk, the City entered into variable interest rate swap transactions in a notional amount of \$800 million, equivalent to the 2006-B COPs series. The swap contracts were insured by FGIC and Syncora to guarantee the quarterly payments defined in the swap agreements.

In 2009, due to the downgrade of the 2006-B series credit rating, the swap counterparties had the right to declare an early swap termination event which, at the time, would have required the City to make a lump sum payment of \$300-400 million to the swap counterparties. In an effort to avoid making such payment, the City pledged certain casino revenues and developer payments as collateral to the swap

counterparties. Approximately \$0.5 million per day is held in a lockbox until the City makes its \$4 million monthly swap payment.

The City's UTGO bond ratings were downgraded in 2012, exposing the City to a subsequent termination event and additional, costly termination payments due to the swap counterparties. In efforts to protect its interest in the collateralized Casino revenues, the City of Detroit entered into multiple mediations and litigation with both the swap counterparties and the swap insurers. The mediation with the swap counterparties resulted in reaching the Forbearance and Optional Termination Agreement that, after significant prodding from the Court, resulted in an agreement for a reduced Optional Termination Payment of \$85 million, payable when the City raises the required Exit Financing or in installments within 180 days of the case's Effective Date.

The Court entered a Swap Settlement order on April 15, 2014, which was subsequently appealed by multiple swap insurers contesting the swap counterparties ability to exercise any optional right of termination of the swap contracts without the insurers' written consent (Syncora Guarantee Inc. v. UBS AG, et al., Adv. Proc. No. 13-05395)⁷⁸. The litigation appears to essentially hinge on two primary issues: 1)

⁷⁸ Quarterly Report with Respect to the Financial Condition of the City of Detroit; Office of the Emergency Manager; dated April 15, 2014.

whether the swap insurers have the right to prevent the City from gaining access to its wagering tax revenues (City of Detroit, Michigan v. Syncora Guarantee Inc. et al., Adv. Proc. No. 13-04942)⁷⁹, and 2) whether the swap counterparties had the “standing” to enter into the FOTA without the swap insurers’ consent. On the first issue, the District Court – in a July 14, 2014 decision - ruled the swap insurers did not have the right to trap the City’s wagering tax revenues. That decision, as well as the ruling on the swap counterparties authority to execute the FOTA without the swap insurers’ consent, will thus be decided by the Sixth Circuit Court of Appeals. To the degree the insurers’ appeal is successful, any clarity of the City’s financial exposure to a potential swap termination payment would be lost and would possibly result in the future restricted access to some portion of the vital Casino revenues.

Collective Bargaining Agreements

The City of Detroit, throughout this bankruptcy process, has been negotiating to reach CBAs with its various labor unions representing the City employees. A total of 47 labor unions represent the City’s employees, all of which had their CBAs

⁷⁹ Quarterly Report with Respect to the Financial Condition of the City of Detroit; Office of the Emergency Manager; dated April 15, 2014.

expire as of June 30, 2013. The City's employees have been subject to City Employment Terms ("CETs") since the expiration of the respective CBAs. The City estimates that the CETs have resulted in more than \$200 million of annualized labor savings.

The City has negotiated many new CBAs with the goal of having them mirror the effective terms of the CETs. Phoenix has recently received the majority of negotiated CBAs, some of which have been fully approved by the State of Michigan, and some of which have been ratified but await the State's approval. Due to the timing of when Phoenix received these CBAs relative to our Report deadline, we have not fully reviewed each of these CBAs. To the degree that the final, agreed-upon terms of the respective CBAs contain aspects that are costlier to the City than the current CETs or contemplated in the projections, the City's liquidity could be negatively impacted. I am further concerned that the newly negotiated CBAs may not have sufficiently addressed the City's historic work rule issues.⁸⁰

⁸⁰ I have received assurance from City advisors that all agreed-upon CBAs are included in the projections.

Potential Asset Sales

Concurrent with the City's bankruptcy process, the City and its representatives have been in discussions with multiple constituencies in efforts to ascertain the optimal utilization of certain assets of the City of Detroit, whether that may be the outright sale of certain assets or the proposed leasing and/or partnership of non-core City assets.

The City has been engaged in longstanding discussions pertaining to the Detroit Water and Sewerage Department ("DWSD") with the surrounding counties with regards to the potential formation of a regional water authority. It is conceivable that a new authority could assume operating control of the majority of DWSD assets. To date, the City has not able to reach an agreement on any disposition of the DWSD assets and, as such, the discussions have migrated to bankruptcy-ordered mediation.

In addition to a possible disposition of the DWSD assets, the City has also inquired with interested parties about the possibility of a public-private partnership. Such partnership would entail the operation and management of the DWSD by qualified candidates who have demonstrated the financial and operational capabilities required to execute the DWSD's operations.

The City, via its Auto Parking System (“APS”), owns and manages seven parking garages containing 6,793 spaces and controls roughly 3,400 on-street metered parking spaces. At the request of the City, Miller Buckfire & Co. has been tasked with exploring the potential monetization of the City’s parking assets. At this time, no definitive decisions have been made by the City regarding these assets.

Lastly, options related to the City’s Coleman A. Young Airport are currently being considered, specifically a possible sale or lease transaction. As the airport is currently a cash drain on the City’s budget, the transfer of this asset could be beneficial to the City’s overall liquidity.

Exit Financing

The City of Detroit is seeking to enter into a \$300 million financing facility (“Exit Facility”), commensurate with the City’s anticipated emergence from bankruptcy. Per the POA, an estimated \$120 million of the Exit Facility will be used to refinance the City’s existing, previously-funded Quality of Life loan. The balance of the Exit Facility is intended to provide the City with liquidity and begin to fund the POA’s restructuring initiatives.

Miller Buckfire & Co. has been engaged to solicit respective parties' interest in the proposed \$300 million financing. To date, an Exit Financing introductory letter and an Exit Financing Indicative Term Sheet have been released to prospective lenders. Phoenix has no visibility into the receptiveness of the financing sources to the proposed debt offering. To the degree the City is not able to procure the anticipated Exit Financing in the amount or at a reasonable interest rate will materially impact the City's cash flow liquidity at its emergence from bankruptcy. As of the date of this Report, it appears that the assumed interest rate of 6% could be low for a high yield instrument like the proposed Exit Financing.

Professional Fees

According to the Plan, the City intends to establish and fund the Professional Fee Reserve, effectively allocating funds for the accrued expenses of professionals during the Chapter 9 bankruptcy. Those funds have been identified in the City's financial forecast.

The services provided by these professional advisors – both legal and financial – are likely to be required by the City after the bankruptcy is confirmed, whenever that occurs. In addition to various litigation matters referenced above, the City's

treasury function, as well as multiple, other financial and departmental functions, are largely performed by outside professionals at this time. This results in two primary concerns: first, many of the everyday functions performed by these outside professionals need to be transitioned to City employees, some of whom may not be hired yet; and, second, the interim, post-bankruptcy costs associated with these outside professionals is not in the City's budget at this time. While the City may be able to transition the Finance-related roles to its employees in the short or mid term, the various ongoing litigations will require a significant near-term financial commitment by the City to its retained legal counsel. The estimated, post-bankruptcy professional fees should be included in the City's near-term financial forecasts as they have the potential to be an immediate use of funds.

Section O - Other Risks and Opportunities

The POA and the projections that support the POA have been developed by the City to provide a reasonable forecast and represent a realistic picture of the City's General Fund.⁸¹ Based upon my team's analysis and numerous discussions with the City's advisors, I understand these projections were not developed either to: 1) account for every opportunity the City may have to generate cash flow in the future, or 2) account for every possible downside risk associated with a loss of revenue or an increase to expenses. While I do not disagree with the City's exclusion of certain items, I believe it appropriate to briefly summarize certain risks and opportunities not fully explored elsewhere in this Report.

⁸¹ Report of Gaurav Malhotra in re City of Detroit, Michigan 13-53846, page 3, "These projected revenues and expenditures are reasonable forecasts and represent a realistic picture of the City's General Fund's ability to afford its expenditures and satisfy its obligations under the plan while maintaining an adequate level of municipal services."

Macro-Economic Issues

I believe the City's economic forecasts that informed the projections considered normalized economic conditions. I do not believe the City's projections accounted for any significant economic disruptions similar to those experienced recently during the Great Recession. Depending on the severity, longevity and the direct impact on urban centers, a long term and negative economic condition could cause serious concerns with meeting the Plan requirements.

State and Federal Funding

The POA relies on a number of external funding sources including the State of Michigan and to a lesser extent the Federal government. The State contributes through annual revenue sharing totaling almost \$2 billion over the first 10 years of the Plan as well as \$194 million as part of the Grand Bargain. Any additional support for Detroit at the State level is not committed and, in fact, revenue sharing could decrease over the life of the Plan.

There is obvious interest by the Mayor in identifying new and recurring support from the Federal government and other grant making bodies. The Plan projections have tended to apply conservative assumptions to the current grants and the availability of additional grants in the future, although it is clear that not all grants

assumed in the projections are committed at this time. Any increase in direct Federal support or grants will help to make the projections more achievable.

Impact of Private Parties

Third party funders have made significant commitments to the City. In fact, the Grand Bargain represents a huge commitment by these City benefactors and is already accounted for in the projections. However, there are a lot of small ways that third party benefactors may directly and indirectly impact the future of the City. The work of the Blight Task Force and the Future Cities Initiative are an example of this and cannot be measured in dollars. There would also be an improvement in the feasibility of the POA if a surge in private investment favorably impacts real estate values, employment and other factors that could contribute favorably to the initiatives in the Plan.

There is a downside to third party involvement as well. It can be fickle; a change in priorities or fortune could reduce the level of funding or delay it. The POA calls for \$366 million from charities and foundations plus an additional \$100 million to be raised by the DIA Corporation as part of the Grand Bargain which will be paid over a 20 year period. Failure of these foundations or benefactors to execute

on their commitments will result in further funding requirements from the City of Detroit.

Exit Financing and Access to Capital Markets

The POA contemplates the closing of an Exit Financing that will support the City's investment and liquidity needs. The projections assume Exit Financing will be a \$300 million facility with an 11 year term, funded on October 31, 2014, with interest only payments in the first 4 years and equal principal payments made in years 5-11. The interest rate is assumed to be 6%.⁸² We understand the City, through its advisors Miller Buckfire & Co., have commenced a process to solicit bids for this financing package. As of the date of this Report, the process is still underway. Mr. Buckfire believes that the Exit Financing process is likely to be successful on the terms outlined.⁸³ In the event that this financing is unavailable to the City on reasonable terms, is significantly lower in terms of facility amount, or is otherwise different than the assumptions in the POA, it is unlikely the City will have sufficient liquidity to operate and satisfy its obligations.

⁸² Report of Gaurav Malhotra in re City of Detroit, Michigan 13-53846, page 14.

⁸³ Expert Report of Kenneth Buckfire in Support of the City of Detroit's Plan of Adjustment in re City of Detroit, Michigan 13-53846 page 3 Section 2.

In addition, I believe it is likely that the City will desire or require access to the capital markets in the future for potentially many different reasons. Mr. Buckfire believes the significant changes as a result of the POA and the State of Michigan's steps to remedy governance will allow the City to again access the capital markets.

⁸⁴ The City's inability to access the capital markets beyond the Exit Financing may limit the City's working capital flexibility and its ability to respond to future, necessary changes in delivery of essential services or capital investments.

DWSD

Detroit Water and Sewerage Department is a significant portion of the City's operations, however, it has very little impact on the General Fund. DWSD largely operates independently from other City business units. While DWSD's debt is impacted by the POA, the DWSD operations are not included in the Plan. DWSD does play a significant role in funding the City's pension obligations during the forecast period⁸⁵. In the event of a significant disruption to the DWSD operations, significant loss of customers impairing its financial prospects, or in the event that

⁸⁴ Expert Report of Kenneth Buckfire in Support of the City of Detroit's Plan of Adjustment in re City of Detroit, Michigan 13-53846 pages 3-5 Sections 3-6.

⁸⁵ DWSD is expected to contribute a total of \$428 million from FY2015-FY2023.

the DWSD contributions are not made according the POA, this could negatively impact on the outcome of the POA.

Sale of Assets

The POA largely excludes the sale of assets. While the sale of certain assets will have established treatment in the POA, there are significant asset sales that are not contemplated in the POA that could positively impact the projections. These assets might include parking related assets and other real estate. I have no visibility into the value of potential asset sales, but I believe they could produce cash which could improve the City's liquidity or revitalization prospects.

Tipping Point

The concept of the Tipping Point was made popular by author Malcolm Gladwell. He characterizes the tipping point as a moment of critical mass or boiling point where a group of small actions hit a threshold point and create an outsized impact.⁸⁶ A tipping point can be either positive or negative. Presently, the City has

⁸⁶ The Tipping Point by Malcolm Gladwell, 2000 published by Little Brown.

momentum and emotional optimism that it can build upon to energize its revitalization. There is no way to stochastically identify this impact and I do not believe the City has included this optimism in its projections. But there is no doubt that it is real.

I believe the City may be experiencing a tipping point that could be either positive or negative. There is a lot of press about support for the City from external parties making significant investment in Detroit. Press accounts suggest percolating interest in real estate and low availability of market rate apartments in small sections of the City. The City is addressing in small ways the quality of life issues, including street lights and blight.

It is beginning to feel like it could be an exciting time to be in Detroit. Tipping points also work in the opposite direction. If the momentum starts to slow in lots of small ways, or if the headlines change from investors buying, to investors selling, or if blight remediation reverses direction, the City could tip backwards. It is a critical point in time for the City of Detroit. My opinion is that it is more likely to tip forward than to tip backwards.

Section P - Conclusions

As noted in the Feasibility Section of this Report, I, along with the Phoenix team, have proffered the following Feasibility Standard for use in determining whether the City of Detroit's Plan of Adjustment is feasible:

'Is it likely that the City of Detroit, after the confirmation of the Plan of Adjustment, will be able to sustainably provide basic municipal services to the citizens of Detroit and to meet the obligations contemplated in the Plan without the significant probability of a default?'

We have further qualified the Standard into two components:

Quantitative

- Are the projections contained in the POA mathematically correct and materially reasonable?
- Are the assumptions that the City has used to develop its projections individually, and when taken as a group, reasonable?
- Is there an adequate contingency included in the projections?

Qualitative

- Does the City have the human resources, or can it likely recruit the human resources, required to meet its obligations under the POA?

- Does the City have the appropriate systems and procedures to monitor its financial performance and to provide early warning signs of variances in performance that might cause the City to fall short of the projections and be unable to meet its obligations under the POA?
- Are there appropriate structures to ensure the City's compliance with the POA and with reasonable government standards of operation?
- Will the City be able to reasonably deliver a minimum level of municipal services?
- Is the City's trajectory sustainable?

The Quantitative Issues

It is my opinion that, except where otherwise noted in my Report, the projections are generally mathematically correct and materially reasonable and therefore fall within the Feasibility Standard I have defined.

It is my opinion that, except where otherwise noted in my Report, the individual assumptions used to build the projections fall into a reasonable range and, that when taken as a group, these assumptions are also reasonable and fall within the Feasibility Standard.

While I have noted issues with the level of contingency in the projections, and feel this must be addressed both as a practical matter and in response to Public Acts 181 and 182 of 2014 controlling law, I believe that there are enough conservative assumptions in the projections to offset what I view as an aggressive assumption

concerning the level of contingencies, particularly in the early years. While I do not believe a 1% contingency is adequate, I believe that the POA projections, taken as a whole, fall within the range of reasonableness and within my definition of the Feasibility Standard.

The Qualitative Issues

As noted in this Report, I believe that human capital and the City's leadership ability are immensely important for the success of this Plan. Current human resources are lacking and senior leadership, while generally capable is not plentiful. To meet the projections in the POA, the City will need to recruit a significant number of employees with improved skill level and continue to change the culture of performance and accountability, I believe that the City has identified human capital as an issue and is addressing this both formally and informally. I am relying on Mayor Duggan, CFO John Hill, and the other capable executives I have met at the City to execute effectively on the human capital strategy.

As noted in this Report, the City's IT systems and procedures are broken and insufficient. I believe that the City's Mayor, CFO and CIO recognize the critical importance of effective technology and systems to the City's revitalization. Each

of these executives has convinced me that correcting the City's IT systems issues is a very high priority. I believe the City has recognized these issues, has identified the magnitude of funding required, and has begun to address both the process and technology issues necessary to bring the systems up to a reasonable standard over the next few years. I do not believe that there is a reasonable alternative that would produce a better, or quicker, result for the City.

I have noted my concern and my personal preference that the CFO report to the Financial Review Commission. I believe this would have provided a greater level of confidence in the City's performance by outsiders, including the capital markets. However, I believe that the existence of the Financial Review Commission provides a reasonable level of oversight to the City and that the CFO is eminently capable and appropriately professional and independent.

The POA and the projections that support the POA are designed to allow the City to continue to improve its level of service to the citizens of Detroit. I believe that the RRI's are reasonable and well considered. If executed, they will allow the City to deliver essential services. It is my opinion that the City is beginning to emerge from the "service delivery insolvency" referenced in Judge Rhodes' opinion concerning eligibility.

By most accounts, there is forward progress being made in the City. I believe the combined efforts of the Emergency Manager and Mayor are addressing service shortfalls. Further, I believe that the expanding efforts of the private sector are also indicative of a City with a positive trajectory. The POA lays out a plan to continue to improve the City services and I believe some of the work done by the Blight Task Force and the Future Cities Initiative will continue to add additional support to the City's positive trajectory.

After extensive interviews with parties knowledgeable about the City and the POA, the review of hundreds of relevant documents and models, and significant independent research and analysis by my team and me, it is my opinion that:

It is likely that the City of Detroit, after the confirmation of the Plan of Adjustment, will be able to sustainably provide basic municipal services to the citizens of Detroit and to meet the obligations contemplated in the Plan without the significant probability of a default.

As noted in Section C of this Report, I believe that the Feasibility Standard exist on a reasonable continuum, therefore, there are actions that can make the POA "more feasible." Throughout my Report I have noted issues that caused me some level of concern. These are issues that, if addressed, would make the POA 'more feasible.' Without any expectation that my concerns will influence the City or the Court, I will briefly summarize my larger concerns.

It should be noted that this opinion is rendered in an environment where there are many factors that will have influence on the City's conditions post confirmation that are unknown and unknowable. Throughout this Report, I have noted some of these factors, while other factors may not even be recognized today as potentially having an impact. My opinion is necessarily limited by these unknown factors. It should be recognized, that these factors, when known, could have a material impact on my view of feasibility.

Integrated Plan

As noted throughout this Report, there is not one controlling set of projections that will provide a financial road map to the City, its constituents and the Financial Review Commission. I recommend that the City immediately produce an integrated plan, which includes the expected initiatives, deferrals and other items, by department and fund. This will provide a longer term roadmap and assist the Mayor, the Financial Review Commission and other interested parties in understanding how the City is making progress towards the forecast detailed in the Plan. This business plan would also meet the requirements established in Public Acts 181 and 182 of 2014.

Oversight

As noted, I would have preferred an oversight model that included a CFO that did not report directly to the Mayor. This is not a statement about the quality of the current Mayor or CFO but rather my view that an oversight structure should be independent of who is the elected official. Given that the structure included in the Grand Bargain legislation does not include this independent CFO, I believe it is imperative that the Financial Review Commission have some permanent staff. My experience in other similar situations allows me to understand the complexity and sheer volume of information that must be analyzed and evaluated to properly execute the oversight function. The legislation provides for the Commission to hire professionals, which it will no doubt need to do, but it will be less costly and better for the long term effectiveness of the Commission, if it has at least a small permanent staff to support the part time, unpaid oversight board.

Pension Plan

One of the driving forces of the City financial problems was the City's, and the pension plans' trustees, failure to appropriately address the growing, unfunded pension liability. With finite resources, competing needs for dollars and the

willingness to push the problem to tomorrow, the pension UAAL continued to grow. This is not only a Detroit problem, but a general municipal finance problem throughout the United States. However, just because it is not *just* a Detroit problem does not mean that Detroit should not make some progress in addressing the macro problems. While the Plan makes progress in addressing this liability, the liability is not fixed. As noted in the Pension section of the Report, there is still risk that the liability could grow significantly. I recognize the difficulty and pain associated with the pension negotiations; and further, I understand the practical nature of the resulting settlements and the City's desire to manage its cash requirements related to pension contributions over the next 10 years. However, this does not fix the liability. The City cannot look away for 10 years and return in FY2023 to find the liability has again become an unmanageable burden. Therefore, I believe it is appropriate that the City be required to annually release the undiscounted liability of each of its pension plans. This will allow outside interested parties to independently evaluate the strength of the plans. Further, I believe that the City should provide a sensitivity analysis consistent with those recommended by the Society of Actuaries Blue Ribbon Panel on an annual basis and provide a discount of the liability based on +/- 3% from the investment return discount rate used in the plan. This level of reporting is not overly burdensome and will provide some level of sunshine into what is otherwise a very opaque process.

RRIs

The RRIs are one of the positive outcomes of the bankruptcy process. The RRIs provide the backbone of improved services to the citizens of Detroit. I believe that the development of a scorecard to track the implementation of the RRIs is an important tracking mechanism that will enable the City and the Financial Review Commission to understand the RRIs' implementation progress.

Respectfully submitted,

Dated: July 18, 2014

/s/ **Martha E. M. Kopacz**

Martha E.M. Kopacz

Exhibit 1

Martha (Marti) E. M. Kopacz
Senior Managing Director
Phoenix Management Services LLC
Ten Post Office Square, Suite 605N
Boston, MA 02110
Mobile - (617) 840-9155
mkopacz@phoenixmanagement.com

Ms. Kopacz has over 25 years' experience assisting stakeholders in analyzing business operations and reorganization possibilities. She has led or participated in over 100 consulting and restructuring engagements representing companies, debtors, investors, creditor committees, banks and Chapter 11 Trustees. Ms. Kopacz has advised in a broad range of industries including not for profit and public sector, retail, leisure and entertainment, technology and professional services. She was one of the first financial advisors to apply turnaround principles to public sector and not for profit organizations. She has served as an Interim President, Chief Restructuring Officer, Chapter 11 Trustee, Collateral Trustee, and Examiner.

General Experience

Ms. Kopacz has prepared dozens of financial projections for clients and reviewed and critiqued dozens more, prepared by others. She has previously testified as to the appropriateness of forecasting methodology, the assumptions upon which forecasts are based and the likelihood of an organization to meet its forecast. She has a deep understanding of the importance of developing assumptions based upon a thorough analysis of relevant data, including historical and prospective information as well as third party, independent data. Ms. Kopacz understands the nuanced area of municipal budgeting. Because municipal entities lack a "standard" in budgeting, forecasting and accounting, great variations occur in the manner in which public entities report financial results and develop forecasts. As such, preparing and evaluating projections for municipalities requires strong business acumen and deep appreciation for the challenges inherent in the forecasting methodology and approach available to the entities.

Relevant Engagements

Ms. Kopacz advised the **Nassau County Interim Finance Authority (NIFA)**, a New York state control board, in their oversight role. In early 2011, NIFA imposed a control period for Nassau County based on a substantial budget deficit. Nassau County has experienced financial difficulties for over a decade despite an annual budget that approaches \$3 billion. The structural deficit for 2012 was estimated at \$300 million. Ms. Kopacz advised NIFA on the financial requirements underpinning the control period, the nature and size of the likely budget deficit and the reasonableness of the County's forecasts. In addition, Ms. Kopacz and her team conducted an in depth review of the business operations of the County and developed over \$300 million of cost reductions and operational improvements, which if implemented would restore Nassau County to a balanced budget in the next few years.

Serving in the capacity of the Chief Restructuring Officer and Interim President, Ms. Kopacz designed, led and executed the out-of-court restructuring of the **Legal Aid Society**, a 135 year old charity with approximately \$150 million in revenue serving the legal needs of the needy in New York City.

Accomplishments included: reducing a \$20 million operating deficit to better than break even; negotiating workforce reductions, compensation and benefit modifications with the UAW (lawyers' union) and the SEIU 1199 (social workers and paralegals' union) representing approximately three-fourths of the Society's 1400 employees; restructuring pension obligations; consolidating real estate, third party suppliers and infrastructure; and restructuring over \$65 million of balance sheet and long term obligations with dozens of creditors and stakeholders, all of which returned the organization to solvency. In addition, Ms. Kopacz led the Society's first ever Strategic Business Planning effort, managed day-to-day operations in conjunction with the Attorney-in-Chief, and received the Society's Pro Bono service awards for 2004 and 2005.

Ms. Kopacz represented **The Educational Resources Institute, Inc. (TERI)**, a large not for profit organization providing college access to underprivileged and underserved populations. TERI's for profit subsidiary was the largest guarantor of private student loans in the country when the securitization market for student loans evaporated. The extensively negotiated plan of reorganization preserved the not for profit mission and return collateral to the original lenders.

Ms. Kopacz worked extensively with the **Archdiocese of Boston** during some of its darkest days. In addition to preparing this socially significant non-profit institution for a contingent bankruptcy filing, she worked with stakeholders to develop a crisis communication plan, arranged interim financing and designed a claims facility to adjudicate tort claims.

Prior Experience

Prior to joining Phoenix Management, Ms. Kopacz founded Brant Point Advisors, a boutique advisory firm. Previously, Ms. Kopacz co-founded and co-lead the U.S. Corporate Advisory and Restructuring Services practice at Grant Thornton LLP and lead the group's public sector initiatives. Earlier in her career she was a Managing Director with Alvarez & Marsal, focused on public sector and not for profit clients, and a Principal with PricewaterhouseCoopers LLP until the practice was sold to FTI Consulting, as which time she was a Senior Managing Director.

Education & Certifications

Masters of Business Administration in Finance and Investments – Kelley School of Business – Indiana University

Bachelor of Science degree in Marketing – Kelley School of Business - Indiana University

Certified Management Accountant

Certified Insolvency and Restructuring Advisor

Affiliations

American College of Bankruptcy – Fellow – Twelfth Class

Turnaround Management Association

American Bankruptcy Institute

International Women's Insolvency and Restructuring Confederation,

Association of Insolvency and Restructuring Advisors

Institute of Management Accountants.

Civic Engagement

Boston 2024 Organizing Committee – Board Member
Legal Aid Society of New York – Board of Advisors
Kelley School of Business - Indiana University – Dean’s Council
Graduate School of Business, Sunkyunkwan University – Dean’s Council
Inly School – former Board of Trustees

Speaking Engagements and Publications

“Municipal Insolvency and Bankruptcy Part 1: Introduction, Overview and Key Issues” – Rhode Island Bar Association Annual Meeting, June 2012

“Municipal Bankruptcy” – Association of Insolvency and Restructuring Advisors Webinar, February 2012

“The Municipal Restructuring under Chapter 9: Legitimate Option or Scare Tactic?” – American Bankruptcy Institute Winter Leadership Conference, La Quinta, CA, December 2011

“Municipal Insolvencies: Is This the Next Wave?” – Turnaround Management Association Northeast Chapter, Boston, MA, November 2011

“Leadership and Political Will – Fixing States’ and Cities’ Fiscal Woes” – Heyman Center Series: America’s Fiscal Crisis – Depression, Recession or Recovery, Cardozo School of Law, New York, New York, October 2011

“Today’s Problems in Municipal Finance – Should Chapter 9 be Extended to States?” – Commercial Finance Association Advocacy Conference, Washington, DC, September 2011

“Turnaround “Apps” for the Public Sector” – Grant Thornton white paper, July 2011

“Chapter 9 Update” – American Bankruptcy Institute Northeast Conference, Newport, RI, July 2011

“Turnarounds in the Public Sector” – Kellogg Turnaround Management Conference, Chicago, IL, May 2011

“Too Big to Fail or Too Big to Bail (Out): a Discussion of the Pros and Cons of Bankruptcy for States” – Grant Thornton white paper, March 2011

“That was Then, This is Now: Financing Your Business in the Current Environment” – Proskauer Grant Thornton Seminar, New York, New York, October 2010

“Navigating Your Portfolio Through Turbulent Waters - Facing The Reality of Being Over Leveraged - And Practical Strategies for Restructuring in Zero Gravity” – Association for Corporate Growth Intergrowth Conference, Miami, May 2010

“Who Has \$\$ and What Are They Buying?” – Caribbean Insolvency Symposium, Grand Cayman, CI, February 2009

“Gaining Support from All of Your Constituencies” – American Bankruptcy Institute Northeast Conference, Brewster, MA, July 2008

Previous Dates – Guest Lecturer at Harvard Business School, Massachusetts Institute of Technology, Bentley College, Northeastern University, Pennsylvania State University and Indiana University concerning various corporate recovery topics. Panelist or Moderator at industry conferences hosted by Turnaround Management Association, American Bankruptcy Institute, Massachusetts Continuing Legal Education, National Credit Managers Association, Food Manufacturers Association, Barclays Bank among others.

Exhibit 2

Exhibit 2**# Document/Source**

- 1 All documents referenced in this report
- 2 All dockets located within KCC (Kurtzman Carson Consultants) data room in re: City of Detroit, Michigan
- 3 All documents located within the RR Donnelley Venue data room, located at <http://www.kccllc.net/detroit/document/list/3666>
- 4 All documents located within the data room constructed for Phoenix Management to catalog the Jones Day data productions, serviced by AlphaLit data room, located at www.go2edirect.com
- 5 All information located within the City of Detroit website, located <http://www.detroitmi.gov/>
- 6 All communications with City of Detroit personnel
- 7 All communications with Advisors of the City of Detroit
- 8 All communications with personnel responsible for the City's pension funds
- 9 All communications with the advisors of the City's pension funds
- 10 Emergency Manager Orders
- 11 Emergency Manager Announcement
- 12 Emergency Manager Reports
- 13 All documents released from the state of Michigan in regards to the City of Detroit Bankruptcy
- 14 American Bankruptcy Journal article titled "The Missing Link to Successful Company Turnarounds – Balance Sheet Management is Only Part of the Story"(March 2014)
- 15 Detroit Blight Removal Task Force publication titled "Every Neighborhood Has A Future... And it Doesn't Include Blight, Detroit Blight Removal Task Force Plan"(May 2014)
- 16 Daily Bankruptcy News article titled "\$4 Trillion In Hidden Muni Liabilities: SEC Commissioner Gallagher" (May 2014)
- 17 Journal of Corporate Renewal article titled "Chapter 9 May Be Tough to Swallow for Unions, Retirees" (June 2014)
- 18 The Society of Actuaries panel titled "Report of the Blue Ribbon Panel on Public Pension Plan Funding"(February 2014)
- 19 The Brookings Institution publication titled "Are Public Pensions Keeping Up With The Times?"(June 2013)
- 20 The Rockefeller Institute of Government publication titled "The Blinken Report: Strengthening the Security of Public Sector Defined Benefit Plans(January 2014)
- 21 BenefitsPro article titled "Public Pensions Hiding Trillions in Liabilities, SEC Commissioner Says"(June 2014)
- 22 Goodwin Proctor article titled "Visionary Schemes Need Not Apply: The Chapter 9 Plan Feasibility Requirement" (June 2013)
- 23 WSJ article titled "Detroit's Bankruptcy Revival " (April 2014)
- 24 Elizabeth Warren, U.S. Senator for Massachusetts press release titled "Rockefeller, Warren Introduce Legislation to Protect Employees and Retirees from Unfair Benefit Cuts"(June 2014)
- 25 Unionwatch Article titled "GASB Loopholes Created Illusions of Insolvency"(March 2013)
- 26 New York Times article titled "Panel Seeks Greater Disclosures on Pension Health"(February 2014)
- 27 The Detroit Free Press article titled "Judge Rhodes spars with Detroit fire union over bankruptcy objection"(July 2016)
- 28 Dow Jones Financial Information Services publication titled "Balancing Best Interests and Feasibility in Chapter 9"(March 2011)
- 29 The Detroit Free Press article titled "Monitor finds Detroit's 36th District Court much improved since May 2013"(May 2014)
- 30 The Detroit Free Press article titled "An energized Detroit Land Bank leads Duggan's blight effort"(May 2014)
- 31 Detroit News article titled "Clearing neighborhood blight to cost \$850M, Detroit group finds"(May 2014)
- 32 California Policy Center article titled "How New Rules from Moody's and GASB Affect the Financial Reporting of Pensions in Seven California Countries"(March 2013)
- 33 Journal of Public Economics article titled "Financial incentives and retirement: evidence from federal civil service workers"(March 2008)
- 34 Boston College Law Review article titled "Some Confirmed Chapter 11 Plans Fail. So What?" (Vol.47)(December 2005)
- 35 American Education Finance Association publication titled Teacher Pension Incentives, Retirement Behavior, and Potential for Reform in Arkansas"-2010
- 36 National Association of State Retirement Administrators publication titled "The 80-percent threshold: Its source as a healthy or minimum funding level for public pension plans)(January 2012)
- 37 C. Scott Pryor publication titled "Who Bears The Cost? The Necessity of Taxpayer Participation in Chapter 9" (June 2013)
- 38 C. Scott Pryor publication titled "Municipal Bankruptcy: When Doing Less Is Doing Best" (April 2014)
- 39 A Collier Monograph titled "Debt Adjustments for Municipalities Under Chapter 9 of the Bankruptcy Code"-2012
- 40 Bankruptcy of Mount Carbon Metropolitan Dist. Bankruptcy No. 91-20215 MSK(November 1999)
- 41 Bankruptcy of the City of Colorado Springs Spring Creek General Improvement District. Bankruptcy No. 94-15333.(January 1995)

Exhibit 2**# Document/Source**

- 42 Detroit Blight Removal Task Force Plan titled, "Every Neighborhood Has a Future . . . And It Doesn't Include Blight," (May 2014)
- 43 McKinsey & Company Publication titled "Delivering large-scale IT projects on time, on budget, and on value"(October 2012)
- 44 City of Detroit Triennial Executive Budget 2015-2017
- 45 Detroit Future City - Detroit Strategic Framework Plan(December 2012)
- 46 Report of Beth Niblock, Chief Information Officer for the City of Detroit; in re: City of Detroit, Michigan Case No. 13-53846
- 47 Report of John Hill, Chief Financial Officer for the City of Detroit; in re: City of Detroit, Michigan Case No. 13-53846
- 48 Report of Kenneth Buckfire, of Miller Buckfire & Co; in re: City of Detroit, Michigan Case No. 13-53846
- 49 Report of Gaurav Malhorta, of Ernst & Young LLP; in re: City of Detroit, Michigan Case No. 13-53846
- 50 Declaration of Gaurav Malhorta, of Ernst & Young LLP; in re: City of Detroit, Michigan Case No. 13-53846(July 2913)
- 51 Report of Robert Cline, of Ernst & Young LLP; in re: City of Detroit, Michigan Case No. 13-53846
- 52 Report of Alan Perry, of Milliman; in re: City of Detroit, Michigan Case No. 13-53846
- 53 Report of Caroline Sallee, of Ernst & Young LLP; in re: City of Detroit, Michigan Case No. 13-53846
- 54 Report of Suzanne Taranto, of Milliman; in re: City of Detroit, Michigan Case No. 13-53846
- 55 Report of Charles Moore, of Conway MacKenzie, Inc.; in re: City of Detroit, Michigan Case No. 13-53846
- 56 Third Amended Plan for the Adjustment of Debts of the City of Detroit; in re: City of Detroit, Michigan Case No. 13-53846.. Doc 4271(April 2014)
- 57 Fourth Amended Disclosure Statement with Respect to Fourth Amended Plan for the Adjustment of Debts of the City of Detroit; in re: City of Detroit, Michigan Case No. 13-53846. Doc 4391
- 58 Opinion Regarding Eligibility; in re: City of Detroit, Michigan Case No. 13-53846. Doc 1945. (December 2013)
- 59 Order to Show Cause Why Expert Witness Should Not Be Appointed; in re: City of Detroit, Michigan Case No. 13-53846. Doc 3170. (March 2014)
- 60 Declaration of Kevyn Orr in Support of City of Detroit, Michigan's Statement of Qualifications Pursuant to Section 109 "C" of the Bankruptcy Code. Doc 11(July 2013)
- 61 City of Detroit: Proposal for Creditors. Prepared by Miller Buckfire & Co., LLC, Jones Day. (June 2013)
- 62 City of Detroit: Operational Restructuring Summary. Prepared by Office of the Emergency Manager. Conway MacKenzie, Inc. (November 2013)
- 63 Independent Auditors' Report on Internal Control. Prepared by KPMG LLP. (December 2012)
- 64 Quarterly Report of the Emergency Manager for the quarterly period of January 1, 2014 through March 31, 2014. (April 2014)
- 65 Letter from Robert Childree of AGA Financial Management Standards Board. Addressed to David Bean, Director of Research and Technical Activities of Governmental Accounting Standards Board (GASB). Comments on Pension Accounting and Financial Reporting. (July 2009)
- 66 Email from Mike Duggan of the City of Detroit. Plan of Adjustment Due Diligence. (May 13, 2014)
- 67 David Whitaker, Director of Legislative Policy Division Staff for the City of Detroit. 2013-2015 Budget Analysis.(May 2014)
- 68 Treasurers Report for 12/2011 Via: City of Detroit, Michigan Notice of Preliminary Financial Review Findings and Appointment of a Financial Review Team. Doc 11-3.(January 2012)
- 69 2012 Financial Review Team Report, prepared by the Detroit Financial Review Team. Doc 11-4. (March 2012)
- 70 Treasury Report. Prepared by Andrew Dillon, Michigan State Treasurer. Doc 11-6(December 2012)
- 71 2013 Financial Review Team Report, prepared by the Detroit Financial Review Team. Doc 11-7.(February 2013)
- 72 Kevyn Orr, Emergency Manager for the City of Detroit. Recommendation Pursuant to Section 18(1) of PA 436. Doc 11-10(July 2013)
- 73 Governor Rick Snyder. Authorization to Commence Chapter 8 Bankruptcy Proceedings. Doc 11-11(July 2013)
- 74 City of Detroit: Alternative Plan of Adjustment Proposal. Prepared by Houlihan Lokey. (September 2013)
- 75 City of Detroit – Restructuring Plan; Mayor's Implementation Progress Report. (March 2013)
- 76 McKinsey Repot on City of Detroit. As posted on the City of Detroit website (May 2011)
- 77 Report prepared by: Sekely, C.(Conway MacKenzie, Inc.), Redmond, C.(Pierce Monroe & Assoc., LLC), Hutchings, C. (Municipal Parking Department). Titled "Revenue Enhancement Actions For Parking Violations Bureau"(December 2013)
- 78 0%
- 79 Kevyn Orr, Emergency Manager, City of Detroit. "Order No. 24: Order to Amend Chapter 55 of the 1984 Detroit City Code"(April 2014)
- 80 Memorandum in Support of Statement of Qualifications Pursuant to Section 109 (
- 81 Order Appointing Expert Witness. Docket #4215
- 82 Notice Regarding Interviews of Expert Witness Applicants, Docket #4068

Exhibit 2**# Document/Source**

83 Docket # 4216, Order Appointing Non-Testifying Consultant
84 Transcript of Hearing, April 18, 2014(April 18, 2014)
85 Milliman Letter Re: City of Detroit Active Health Plan Projections (November 2014)
86 NASRA Issue Brief: "Public Pension Plan Investment Return Assumptions"; April 2014; original source: U.S. Census Bureau
87 Milliman, Inc. letter(April 17, 2014)
88 Milliman, Inc. letter(April 20, 2014)
89 Milliman, Inc. letter(April 23, 2014)
90 Milliman, Inc. letter(April 25, 2014)
91 Milliman, Inc. letter(May 7, 2014)
92 Milliman, Inc. letter(July 2014)
93 Milliman, Inc. letter(November 2, 2013)
94 Milliman, Inc. letter(November 3, 2013)
95 Milliman, Inc. letter(July 9, 2014)
96 The Blinken Report- Strengthening the Security of Public Sector Defined Benefit Plans, dated January 2014. Donald J Boyd and Peter J Kiernan
97 The Society of Actuaries "Report of the Blue Ribbon Panel on Public Pension Plan Funding"; February 2014
98 Governmental Accounting Standards Board
99 Memorandum in Support of Statement of Qualifications Pursuant to Section 109 (c) of the Bankruptcy Code. Docket No 14(July 2013)
100 State of Michigan Enrolled House Bill No. 5566 (June 2014)
101 State of Michigan Enrolled House Bill No. 5567(June 2014)
102 State of Michigan Enrolled House Bill No. 5568(June 2014)
103 State of Michigan Enrolled House Bill No. 5569(June 2014)
104 State of Michigan Enrolled House Bill No. 5570(June 2014)
105 State of Michigan Enrolled House Bill No. 5573(June 2014)
106 State of Michigan Enrolled House Bill No. 5574(June 2014)
107 State of Michigan Enrolled House Bill No. 5575(June 2014)
108 State of Michigan Enrolled House Bill No. 5576(June 2014)
109 State of Michigan Enrolled House Bill No. 5600(June 2014)
110 Deposition of Gaurav Malhorta, of Ernst & Young LLP; in re: City of Detroit, Michigan Case No. 13-53846(September 9, 2013)
111 Deposition of Gaurav Malhorta, of Ernst & Young LLP; in re: City of Detroit, Michigan Case No. 13-53846(September 20, 2013)
112 Deposition of Gaurav Malhorta, of Ernst & Young LLP; in re: City of Detroit, Michigan Case No. 13-53846(December 11, 2013)
113 Deposition of Gaurav Malhorta, of Ernst & Young LLP; in re: City of Detroit, Michigan Case No. 13-53846(March 31, 2014)
114 Comprehensive Annual Financial Report, City of Detroit FYE June 30, 2012
115 City of Detroit, IT Optimization Discussion Document (August, 2013)
116 FAB Financial Subcommittee Meeting (January 2014)
117 ERP Needs Assessment: City of Detroit. Prepared by Plante Moran
118 ERP Cost Analysis
119 HR Technology Assessment, City of Detroit (December 2013)
120 Plan of Adjustment (May 2014)
121 Plan of Adjustment (July 2014)
122 PVB Revenue Enhancement White Paper (December 2013)
123 NASRA Issue Brief titled "Public Pension Plan Investment Return Assumptions" (April 2014)
124 "The Tipping Point" by Malcom Gladwell (2000)
125 Yale Law Journal Publication titled "The New Minimal Cities" (March 2013)

Exhibit 3

Exhibit 3				
Date	Phoenix Attendees	Attendees	Type of Meeting	Topics
4/22/2014	Marti Kopacz	Bob Fishman - Shaw Fishman	Call	Discuss procedures
4/22/2014	Marti Kopacz	Neal Munshi - Reporter at Financial Times	Call	Discuss Phoenix's role in Detroit Bankruptcy
4/22/2014	Marti Kopacz	Tom Hals- Reporter at Reuters	Call	Discuss Phoenix's role in Detroit Bankruptcy
4/22/2014	Marti Kopacz	Chris Christoff- Reporter at Bloomberg	Call	Discuss Phoenix's role in Detroit Bankruptcy
4/22/2014	Marti Kopacz	Steve Buchanan - Reporter at NYTimes	Call	Discuss Phoenix's role in Detroit Bankruptcy
4/22/2014	Marti Kopacz	Seth Brumby - Reporter at Debt wire	Call	Discuss Phoenix's role in Detroit Bankruptcy
4/22/2014	Marti Kopacz	Pat Halligan- Reporter at The Deal	Call	Discuss Phoenix's role in Detroit Bankruptcy
4/22/2014	Marti Kopacz	Heather Lennox - Jones Day	Call	In regards to the contact info for the City's Advisors and CFO
4/23/2014	Marti Kopacz	Judge Rosen	Meeting	Case Background
4/23/2014	Marti Kopacz	Peter Hammer	Call	In regards to the city history
4/23/2014	Marti Kopacz	Eugene Drinker	Call	Schedule tour
4/23/2014	Marti Kopacz	Stephen Lerner - Squire Sanders	Call	In regards to representation
4/24/2014	Marti Kopacz	Barbara Patek - Ermann Teicher	Email	Scheduling emails for meeting with public safety unions
4/25/2014	Marti Kopacz	Gregory Clash - Municipal Credit Consultants	Email	Offer of service on project team
4/25/2014	Marti Kopacz	Arthur O'Reilly - Honigman	Email	Scheduling Meeting with DIA
4/25/2014	Marti Kopacz	Robert Gordon - Clark Hill	Email	Scheduling with Pension System
4/28/2014	Marti Kopacz	Richard Levin - Cravath	Email	In regards to the DIA meeting
4/28/2014	Marti Kopacz	Heather Lennox - Jones Day	Email	In regards to work space
4/29/2014	Marti Kopacz, Bob Childree, Brian Gleason	Rodney Sizemore, Mark Diaz, Mark Young, Jeffery Pegg, Barbara Patek, Chris Legin, Elise Osbourne, Jim Moore, Donna Lato, Stacy Carin	Meeting	General discussion of Police and Fire Union issues, positions on the POA
4/29/2014	Marti Kopacz	Sharma Liveria - Sandler	Email	Schedule meeting
4/29/2014	Marti Kopacz	Robert Duffy - FTI	Email	Schedule meeting
4/29/2014	Marti Kopacz	David Parker - Goldin & assoc.	Email	Schedule meeting
4/29/2014	Marti Kopacz	Albert Koch - Alix Partners	Email	Schedule meeting
4/29/2014	Marti Kopacz	Scott Davido - FTI	Email	Schedule meeting
4/29/2014	Marti Kopacz	Eunice Hayes - City of Detroit	Email	Schedule meeting
4/30/2014	Marti Kopacz, Al Mink, Bob Childree, Michael Gaul, Brian Gleason, Kevin Barr	Eugene Drinker, Attorney and Jeri Stroupe, Office of Economic Development at Wayne State	Bus Tour	Tour of the city
4/30/2014	Marti Kopacz	Thomas Mayer - Kramer	Call	To get contact info for COPs and insurer contact
4/30/2014	Marti Kopacz	Vincent Marriott-Ballard Spahr	Email	Schedule Meeting
4/30/2014	Marti Kopacz	Alfredo Perez - Weil	Email	Schedule Meeting
4/30/2014	Marti Kopacz	Ryan Bennett- Kirkland & Ellis	Email	Schedule Meeting
5/1/2014	Marti Kopacz, Bob Childree	Kevyn Orr , Sonya Mays, Stacy Fox - Emergency Manager	Meeting	Discuss City, Kevyn's role, long-term risks culture, behavior
5/1/2014	Marti Kopacz	Robert Gordon, JosephTurner, Ronald King Clark Hill, Michael VanOverbeke - VanOverbeke, Michaud	Meeting	Case Background
5/1/2014	Marti Kopacz	Scott Davido - FTI	Call	Scheduling
5/1/2014	Marti Kopacz	Alfredo Perez, client and colleagues - Weil Steve Spencer and John Popehn - Houlihan	Call	Case Background
5/2/2014	Marti Kopacz	Kenneth Buckfire - Miller Buckfire	Meeting	Case Background
5/2/2014	Marti Kopacz	Heather Lennox- Jones Day	Call/email	Protocol for meeting with City employees and advisors
5/2/2014	Marti Kopacz	Stephen Lerner- Squire Sanders	Call	Jones Day request for JD attorney participation in City contacts
5/5/2014	Marti Kopacz	Michael Imber & team- Alvarez & Marsal	Call	Access to A&M insights and work product
5/5/2014	Marti Kopacz	Ryan Bennett, Steve Hackney- Kirkland & Ellis	Call	Case Background
5/7/2014	Marti Kopacz	Judge Rosen- US District Court	Call	Access to info; Counsel participation in interviews
5/7/2014	Marti Kopacz	Judge Rhodes-US Bankruptcy Court	Call	Access to info; Counsel participation in interviews
5/7/2014	Marti Kopacz	Sheila Cockrel-Former Councilwoman	Meeting	Detroit financial and operational history
5/7/2014	Marti Kopacz, Brian Gleason	Dick Ravitch-Judge's Expert	Meeting	Introductory meeting
5/7/2014	Marti Kopacz	Gene Gargaro, Graham Beal, Annemarie Erickson-DIA	Meeting	Art disposition; grand bargain feasibility
5/7/2014	Marti Kopacz	Bob and Susie Bluestein, Gerald Rosen, Kevyn Orr, Mike Duggan, Richard Ravitch, Rip Rapson, Tom Lewand, Victoria Roberts, Gene Drinker, Gene Gargaro (plus spouses)- Various	Dinner Party	Introduction to Detroit
5/8/2014	Marti Kopacz, Brian Gleason	Mike Duggan-Mayor of Detroit	Meeting	POA Due Diligence
5/9/2014	Marti Kopacz	Dan Moss-Jones Day	Call	Access to info; Counsel participation in interviews
5/12/2014	Marti Kopacz	Stephen Lerner- Squire Sanders	Call	Retention and hearing
5/12/2014	Marti Kopacz	Vince Marriott-Ballard Spahr	Meeting	Case Background
5/13/2014	Marti Kopacz, Bob Childree, Michael Gaul, Kevin Barr	Bob Kline - Ernst & Young	Call	Revenue assumptions
5/13/2014	Marti Kopacz, Bob Childree	Kurt Beckerman, Albert Koch - AlixPartners, Samuel Kohn - Chadbourne & Park LLP , Guy Neal , Sidley	Meeting	POA, projections, EM, Areas of opportunity Labor, DWSD, Discuss Alix Partners' work product and insights
5/13/2014	Marti Kopacz	David Prager, Jay Goldin-Goldin & Assoc.	Call	Case Background and their work product
5/13/2014	Marti Kopacz	Dan Moss-Jones Day	Call	Document control procedures for our requests to E&Y, CM, MB and City
5/13/2014	Marti Kopacz	Stephen Lerner- Squire Sanders	Call	Expert witness procedures
5/13/2014	Marti Kopacz	Judge Rhodes-US Bankruptcy Court	Call	Supplemental Order

Exhibit 3				
Date	Phoenix Attendees	Attendees	Type of Meeting	Topics
5/14/2014	Marti Kopacz, Michael Gaul, Brian Gleason, Kevin Barr	Juan Santambrogio and Gaurav Malhotra - Ernst & Young	Call	10 year - 40 Year plan
5/14/2014	Marti Kopacz, Bob Childree, Michael Gaul, Brian Gleason, Kevin Barr	Stephen Lerner and Scott King - Squire Sanders	Call	Instructions re: document control; access to E&Y working model
5/14/2014	Marti Kopacz, Brian Gleason	Mike Duggan & staff-City of Detroit	Meeting	Attend Cabinet meeting
5/14/2014	Marti Kopacz, Brian Gleason	Rip Rapson, Laura Trudeau-Kresge Foundation	Meeting	Detroit Future Cities, Grand Bargain due diligence
5/15/2014	Marti Kopacz	Richard Ravitch-Judge's Expert	Call	Engagement Update
5/19/2014	Marti Kopacz	James Craig and Lesley Warmuth -Chief of Police and Pepper Hamilton	Meeting	Background interview re: Police Department
5/19/2014	Marti Kopacz	Richard Ravitch-Judge's Expert	Meeting	Pensions
5/20/2014	Marti Kopacz	Dan Dirks and team-DDOT Director	Meeting	Background interview re: Transportation Department
5/20/2014	Marti Kopacz	Stacy Fox-Deputy EM	Meeting	Information Requests Outstanding
5/20/2014	Marti Kopacz	Chuck Moore and Glenn Kushiner-Conway Mackenzie	Meeting	Pensions
5/20/2014	Marti Kopacz, Brian Gleason	Stephen Lerner- Squire Sanders	Call	Information Requests Outstanding
5/21/2014	Marti Kopacz, Michael Gaul, Brian Gleason	Mayor Duggan and Cabinet-City of Detroit	Meeting	General POA discussion
5/22/2014	Marti Kopacz, Brian Gleason	Stephen Lerner- Squire Sanders	Call	Information Requests Outstanding; Letter to Judge
5/22/2014	Marti Kopacz	Gaurav Malhotra -Ernst & Young	Call	Returning my emails re: Information Request Outstanding and letter to the Judge
5/23/2014	Marti Kopacz	Stephen Lerner- Squire Sanders	Call	Follow up on his conversations with Jones Day re: info requests
5/27/2014	Marti Kopacz	Stephen Lerner- Squire Sanders	Call	Prep for hearing on Wednesday
5/28/2014	Marti Kopacz, Brian Gleason	Richard Ravitch-Judge's Expert	Meeting	Report development discussion
5/29/2014	Marti Kopacz, Brian Gleason, Kevin Barr	Mike Imber, Nancy Zielke, Bill Roberti - Alvarez & Marsal, Marianna Marysheva - Martinez, Joe Nichols, David Lawrence - FTI Consulting, Ryan Bennett, Noah Ornstein - Kirkland & Ellis, Jennifer Rothschild - Rothschild, Steven Spencer, John Popehn, Michael Lin, John Pepehn, Daniel Mn - Houlihan Lokey, Alfredo Perez, Kelly DiBlasi, Dana Kaufman - Weil	Meeting	Review other financial advisors' inquiries and learnings
5/29/2014	Marti Kopacz	Erica Ward-Land Bank Authority	Call	Blight
5/30/2014	Marti Kopacz	Melissa Smiley-City of Detroit	Call	Blight
6/2/2014	Marti Kopacz, Michael Gaul, Brian Gleason	Judge Rhodes, Jones Day, and Squire Sanders	Call	Bankruptcy discovery transmission issues
6/2/2014	Marti Kopacz, Michael Gaul, Brian Gleason	Stephen Lerner - Squire Sanders	Call	Bankruptcy discovery transmission issues
6/3/2014	Marti Kopacz	Richard Ravitch - Judge's Expert	Call	Catch up on case developments
6/3/2014	Marti Kopacz	Stephen Lerner - Squire Patton Boggs	Call	Update on document requests
6/3/2014	Marti Kopacz	Erica Ward - Detroit Land Bank Authority	Call	Blight
6/3/2014	Marti Kopacz, Michael Gaul, Brian Gleason	Kevin Hand & Glenn Kushiner - Conway Mackenzie, Gaurav Malhotra, Juan Santambrogia & Dan Jerneycic - Ernst & Young, Melissa Smiley - City of Detroit, & Jones Day	Meeting	10 yr and 40 yr projections and reinvestment initiatives
6/3/2014	Marti Kopacz	Barbara Patek - Ermann Teicher	Call	Schedule meeting with firefighters and police unions
6/3/2014	Marti Kopacz	Chris Leggio - Counsel to Firefighters	Call	Schedule meeting with firefighters
6/3/2014	Marti Kopacz	Sharon Levine - Lowenstein Sandler	Email	Schedule meeting with AFSCME
6/3/2014	Marti Kopacz, Michael Gaul, Brian Gleason	Jones Day, E&Y, CM	Call	Open Information Request list
6/4/2014	Marti Kopacz, Brian Gleason	John Hill - City of Detroit/EM	Meeting	Follow up on conversation from Mayor's Cabinet meeting
6/5/2014	Marti Kopacz, Brian Gleason	Mary Martin - City of Detroit	Meeting	Discuss Lean initiatives
6/5/2014	Marti Kopacz, Brian Gleason	Gaurav Malhotra - Ernst & Young, Chuck Moore - Conway Mackenzie	Meeting	POA Issues re: Feasibility
6/5/2014	Marti Kopacz, Michael Gaul, Brian Gleason	Representatives of Detroit Land Bank Authority, CM, and Sonya Mays	Meeting	Blight remediation
6/5/2014	Marti Kopacz, Michael Gaul, Brian Gleason	Mayor Duggan & Staff	Meeting	Reconciliation of POA and Triennial Budget
6/6/2014	Marti Kopacz	Mayor Duggan, Melissa Smiley, Trish Stein, Tom Lewand - City of Detroit, Michelle - Consultant to Planning and Development Department	Meeting	Budget review meeting for planning department and economic development
6/6/2014	Marti Kopacz	Mike Imber - Alvarez & Marsal	Call	Inquired about report deadline extension
6/6/2014	Marti Kopacz	Chris Gannon - Conway Mackenzie	Meeting	BSEED restructuring initiatives
6/7/2014	Marti Kopacz	Mayor Duggan, Gary Brown, Melissa Smiley, Pam Scales - City of Detroit, Dan Dirks and team - DDOT - City of Detroit, Beth Niblock - ITS - City of Detroit, Ron Brundidge and team - DPW - City of Detroit, Beau Taylor and team - DLP - City of Detroit, Norman White and team - Parking - City of Detroit	Meeting	Budget reviews and POA reconciliation
6/9/2014	Marti Kopacz, Brian Gleason	Judge Rhodes - US Bankruptcy Court, Stephen Lerner - Squire Patton Boggs	Call	Scheduling status
6/9/2014	Marti Kopacz, Michael Gaul, Brian Gleason	Judge Rhodes, Jones Day, E&Y, CM, and Squire Sanders	Call	Bankruptcy discovery transmission issues

Exhibit 3				
Date	Phoenix Attendees	Attendees	Type of Meeting	Topics
6/10/2014	Marti Kopacz	Mayor Duggan, Melissa Smiley, Pam Scales, Law Department team - City of Detroit, Representatives of E&Y and CM	Meeting	Budget Review
6/10/2014	Marti Kopacz	Brenda Jones, Stephen Grady - City Council	Meeting	Plan of Adjustment
6/11/2014	Marti Kopacz	Mayor, Melissa Smiley, Pam Scales, Chief Craig and team - City of Detroit, Representatives of E&Y and CM	Meeting	Budget Review
6/11/2014	Marti Kopacz, Brian Gleason	Judge Rosen - US District Court, Mediators - Various, Jones Day, E&Y, CM - Advisors to the City, Richard Ravitch - Judge Rhodes' Consultant, Stephen Lerner - Squire Patton Boggs (via phone)	Meeting	Feasibility for the POA
6/11/2014	Marti Kopacz, Michael Gaul, Brian Gleason	Mayor Duggan & Staff	Meeting	Departmental meetings - DPD and DFD
6/12/2014	Marti Kopacz	Mark Diaz and team - DPOA, Barbara Patek - Counsel to DPOA, Richard Ravitch - Judge Rhodes' Consultant	Meeting	Police Department
6/12/2014	Marti Kopacz, Brian Gleason	Kevyn Orr - Emergency Manager, Stacy Fox - Office of the EM, Richard Ravitch - Judge Rhodes' Consultant	Meeting	Status of Assignment
6/12/2014	Marti Kopacz	John Hill - City of Detroit, Representatives of E&Y and CM, Leslie Warmuth - Pepper Hamilton, Richard Ravitch - Judge Rhodes' Consultant	Meeting	Review Finance, Accounting and IT issues
6/14/2014	Marti Kopacz	Heather Lennox - Jones Day, Gaurav Malhotra - Ernst & Young	Call	New POA date and projections update
6/14/2014	Marti Kopacz	Judge Rhodes - US Bankruptcy Court, Stephen Lerner - Squire Patton Boggs	Call	Status on Report completion
6/16/2014	Marti Kopacz, Brian Gleason	Richard Ravitch - Judge Rhodes' Consultant	Meeting	Work on Report sections - Pensions and Post Confirmation Issues
6/17/2014	Marti Kopacz	Sharon Levine - Lowenstein Sandler, Stephen Kreiser - AFSCME, Richard Ravitch - Judge Rhodes' consultant	Meeting	Union issues
6/17/2014	Marti Kopacz, Brian Gleason	Kenneth Buckfire, Jim Doak and team - Miller Buckfire	Meeting	Update on Asset Dispositions and Exit Financing
6/18/2014	Marti Kopacz	Stephen Lerner - Squire Patton Boggs, Geoff Stewart and others - Jones Day	Call/email	Document production; "Big Issues" Meeting; projections v.11
6/19/2014	Marti Kopacz, Al Mink, Bob Childree, Michael Gaul, Brian Gleason, Kevin Barr	John Naglick, Glenn Kushiner, Dan Jerneyic, E&Y, Rick Drum, Accounting, Renee Shorts, budgets	Call	Round table conference call to discuss state of the monthly reporting that the City is generating, and ability to do post emergence reporting against budget. Post call with Bob Childree
6/19/2014	Marti Kopacz, Michael Gaul, Brian Gleason, Kevin Barr, Stephen Lerner	Juan Santambrogio and Gaurav Malhotra - Ernst & Young, Chuck Moore and Glenn Kushiner - Conway Mackenzie, Jones Day Team	Meeting	"Big Issues" Meeting and feasibility assessment
6/19/2014	Marti Kopacz	Noah Ornstein - Kirkland & Ellis	Call	Inquiry re: confirmation issues for creditors
6/20/2014	Marti Kopacz, Brian Gleason	Melissa Smiley - City of Detroit	Call	New projections and impact on Mayor's Budget Reviews
6/24/2014	Marti Kopacz	Mayor, Melissa Smiley, Pam Scales, Brad Dick and team - City of Detroit, Representatives of E&Y and CM	Meeting	Budget Review Meeting for GSD
6/24/2014	Marti Kopacz	Mike Imber - Alvarez & Marsal	Call	Inquiry re: contingency provisions in HB 5567
6/24/2014	Marti Kopacz	Melissa Smiley - City of Detroit	Call	Discuss financial requirements in Grand Bargain legislation
6/25/2014	Marti Kopacz	Melissa Smiley - City of Detroit, Dan Jerneyic - Ernst & Young	Call	Utility cost estimates in POA projections
6/25/2014	Marti Kopacz	Stephen Lerner - Squire Patton Boggs	Call	Information Requests
6/26/2014	Marti Kopacz, Brian Gleason	Prof. Scott Pryor - Regent University	Call	Ch. 9 feasibility article
6/27/2014	Marti Kopacz	Melissa Smiley - City of Detroit	Call	Future utility costs
6/30/2014	Marti Kopacz	Mayor, Melissa Smiley, Pam Scales, Dan Dirks and team - City of Detroit, Representatives of E&Y and CM	Meeting	Budget Review for DDOT
7/1/2014	Marti Kopacz, Michael Gaul, Kevin Barr	Daniel Jerneyic - Ernst & Young, Chris Gannon - Conway Mackenzie	Call	40 year revised draft projections discussion
7/2/2014	Marti Kopacz, Michael Gaul	Melissa Smiley - City of Detroit	Call	New Projections Pending
7/2/2014	Marti Kopacz, Michael Gaul, Brian Gleason	Mayor Duggan & Staff	Call	Departmental meeting - DFD
7/3/2014	Marti Kopacz	Mayor Cabinet Members - City of Detroit	Meeting	Mayor's weekly status meeting
7/9/2014	Marti Kopacz, Brian Gleason	Richard Ravitch - Judge Rhodes' Consultant, Peter Kiernan - Schiff Hardin	Meeting	Revised projections and impact on feasibility
7/9/2014	Marti Kopacz	Steven Hackney - Kirkland & Ellis	Call	District Court decision on wagering revenues
7/10/2014	Marti Kopacz	Stephen Lerner - Squire Patton Boggs, Geoff Stewart - Jones Day	Call/email	Outstanding information requests
7/10/2014	Marti Kopacz	Heather Lennox - Jones Day	Call	DWSD
7/14/2014	Marti Kopacz, Brian Gleason	Judge Rhodes - US Bankruptcy Court, Stephen Lerner - Squire Patton Boggs, Geoff Stewart - Jones Day	Call	Status call re: scheduling and report due date
7/16/2014	Marti Kopacz, Michael Gaul, Brian Gleason, Kevin Barr	Richard Ravitch - Judge Rhodes' Consultant	Meeting	Report development discussion
7/17/2014	Marti Kopacz	Stacy Fox-Deputy EM	Call	Requesting draft of report
7/17/2014	Marti Kopacz	Melissa Smiley - City of Detroit	Call	Requesting draft of report

Exhibit 3

Date	Phoenix Attendees	Attendees	Type of Meeting	Topics
4/29/2014	Al Mink, Bob Childree, Michael Gaul, Brian Gleason, Kevin Barr	Barbara Patek	Meeting	Debrief on meeting with Fire and Police Unions
4/30/2014	Al Mink, Bob Childree	John Hill CFO	Meeting	Discussed John Hill's vision for the Finance and Accounting function and the major issues he believes the Department faces
4/30/2014	Michael Gaul, Kevin Barr	Juan Santambrogio and Daniel Jerneycic - Ernst & Young	Meeting	10 Year Plan Development
5/1/2014	Al Mink, Bob Childree	John Naglick, Finance Director	Meeting	Issues facing the Finance department, specifically those departments reporting to John Hill. John walked us through his view of the status of each of the departments reporting to him.
5/2/2014	Michael Gaul, Kevin Barr	Kevin Hand, Chris Gannon and Glenn Kushiner - Conway Mackenzie	Meeting	General Restructuring and Reinvestment discussion/development
5/5/2014	Al Mink	Michael Jameson, Deputy Finance Director	Meeting	Meeting to discuss his views of the issues facing the departments reporting to John Hill.
5/5/2014	Al Mink	Glenn Kushiner, Conway, Chris Gannon, Conway	Meeting	Discussed finance department and begin to get into details. Discussed more specifics on each of the departments
5/5/2014	Al Mink	Glenn Kushiner, Conway, Chris Gannon, Conway	Meeting	Discussed their views of finance department and begin to get into details. Discussed more specifics on each of the departments
5/5/2014	Michael Gaul	Kevin Hand, Chris Gannon and Glenn Kushiner - Conway Mackenzie	Meeting	General Restructuring and Reinvestment discussion/development
5/6/2014	Al Mink, Bob Childree	Donald Settles, Risk Manager, Glenn Kushiner, Conway	Meeting	Overview and details of the Risk Management department. Discussed the existing structure, and restructuring alternatives being investigated including potentially outsourcing the Third party administration of Workers Comp and engaging a third party insurance policy to cover auto
5/6/2014	Al Mink, Bob Childree	Gary Evanko, Glenn Kushiner	Meeting	Accepted reassessment plan, impact on forecasted revenues, and restructuring of the Assessors department
5/6/2014	Al Mink, Bob Childree	Gary Evanko, Chief Assessor	Meeting	Property tax process, organization, issues, problems
5/6/2014	Al Mink, Bob Childree	Glenn Kushiner and Chris Gannon - Conway Mackenzie	Meeting	DWSD, CFO restructuring, Plante Moran's role
5/7/2014	Michael Gaul, Kevin Barr	Kevin Hand and Emily Petrovski - Conway Mackenzie	Meeting	Fire and Rec Departments
5/7/2014	Kevin Barr	Chris Gannon and Emily Petrovski - Conway Mackenzie	Meeting	Ombudsperson and Mayors Office
5/7/2014	Al Mink, Bob Childree	Boysie Jackson, Director Purchasing and Glenn Kushiner - Conway Mackenzie	Meeting	Procurement processes, issues, contracts, personal services contracts, RFP process, people, POA, risks
5/7/2014	Al Mink, Bob Childree	Pam Scales, Budget Director and Glenn Kushiner	Meeting	Budget process, Staffing, organization, POA staffing, and issues
5/8/2014	Al Mink, Bob Childree	Boise Jackson purchase director, Glenn Kushiner	Meeting	Over view of the Purchasing department including restructuring initiatives, processing of contracts, approvals for expenditures
5/8/2014	Al Mink, Bob Childree	Glenn Kushner, Pam Scales, Budget Director	Meeting	the development of 2015 Budget submission to Council using the Budget in the plan of adjustment. Also discussed challenges in reporting against budget.
5/8/2014	Kevin Barr	Chris Gannon and Danielle Iafrate - Conway Mackenzie	Meeting	Police Department
5/8/2014	Kevin Barr	Kevin Hand and Emily Petrovski - Conway Mackenzie	Meeting	Blight
5/8/2014	Kevin Barr	Todd Eddy - Conway Mackenzie	Meeting	General Services Department
5/8/2014	Kevin Barr	Todd Eddy - Conway Mackenzie	Meeting	36th District Court and DDOT
5/8/2014	Al Mink, Bob Childree	Glenn Kushiner - Conway Mackenzie	Meeting	Conway's role, scope of work, issues
5/8/2014	Al Mink, Bob Childree	Eric Higgs	Meeting	Financial reporting, CAFR, Reporting post bankruptcy reconciliations, staffing issues
5/8/2014	Al Mink, Bob Childree	Leighton Duncan and Glenn Kushiner	Meeting	Treasury functions, revenue collections outsourcing, organization, retention,
5/8/2014	Al Mink, Bob Childree	Mark Lockridge, Auditor General	Meeting	audits, internal controls, findings, organization, functions, issues
5/8/2014	Michael Gaul	Juan Santambrogio - Ernst & Young	Call	10 year - 40 Year plan
5/9/2014	Al Mink, Bob Childree	Leighton Duncan, Project Manager, Treasury, and Glenn Kushner.	Meeting	Discussed status of Treasury department functions and restructuring.
5/9/2014	Al Mink, Bob Childree	Glenn Kushner	Meeting	Discussed Conway activities; restructuring activities in departments and helping to implement changes.
5/9/2014	Al Mink, Bob Childree	Eric Higgs, Chief accounting officer, Glen Kushner.	Meeting	Discuss the current activities of the Accounting department and the issues.
5/9/2014	Al Mink, Bob Childree	Mark Lockridge, Auditor General, Glenn Kushiner	Meeting	Mark is going to provide us with audit reports on the Accounting and finance functions he has conducted in recent years.
5/9/2014	Kevin Barr	Chris Gannon - Conway Mackenzie	Call	Planning & Development, City Council and Building & License
5/9/2014	Kevin Barr	Kevin Hand - Conway Mackenzie	Call	Airport
5/9/2014	Kevin Barr	Danielle Iafrate - Conway Mackenzie	Call	Law
5/9/2014	Al Mink, Bob Childree	Sonya Mays, Dan Sutton, Nakia Johnson, Chris Gannon - Conway Mackenzie	Meeting	Grants Management...projects, plans, timeframes,
5/12/2014	Al Mink	Glenn Kushiner	Meeting	Review global 10 year forecast spread sheets and then focused on the restructuring spreadsheets for each of the finance and accounting functions

Exhibit 3

Date	Phoenix Attendees	Attendees	Type of Meeting	Topics
5/12/2014	Al Mink	Michael Swartz, Plante Moran, Adam Rujan, Plante Moran, Laurie Zyla, Plant Moran, Glenn Kushiner, Chris Gannon, Sonya Mays Nakia Johnson	Meeting	Discuss status of new ERP proposal. Discuss with Michael Swartz, Plante Moran's contribution to the Year End Closing process. Discuss issues with doing monthly financial statements.
5/12/2014	Al Mink	Glenn Kushiner, Beth Niblock, CIO and Charles Dodd.	Meeting	Overview of current status of Department and the vision for implementation of an integrated ERP System.
5/13/2014	Al Mink	Glenn Kushiner	Meeting	10 year reorganization budget spreadsheets for the finance and accounting departments.
5/13/2014	Al Mink, Bob Childree	Chris Gannon, Sonya Mays, Nakia Johnson	Meeting	Development of the new Grants administration department.
5/13/2014	Al Mink	Glenn Kushiner	Meeting	Review organization Chart.
5/14/2014	Al Mink	Glenn Kushiner	Meeting	Review of Finance and Accounting pre-reorganization organization charts
5/14/2014	Bob Childree, Michael Gaul, Brian Gleason, Kevin Barr	Juan Santambrogio, Gaurav Malhotra and Daniel Jerneycic - Ernst & Young	Call	Pension and OPEB Conversation
5/19/2014	Al Mink	Glenn Kushiner	Meeting	Meeting to discuss centralization of Accounting and Finance
5/19/2014	Al Mink	Dan Jerneycic, an Juan Santambrogio E&Y	Meeting	Discuss E&Y Cash Flows and Cash flow procedures. Also discuss EM reports and discuss post emergence monthly reporting
5/19/2014	Al Mink, Kevin Barr	Juan Santambrogio, Daniel Jerneycic and Nick Bugden - Ernst & Young	Meeting	Cash Forecasting
5/20/2014	Al Mink	Glenn Kushiner	Meeting	Review Data Requests
5/21/2014	Al Mink, Bob Childree	Tanya Stoudemire, Income Tax Manager and Glenn Kushiner	Meeting	Over view of the Income Tax Department, initiatives and plans for Restructuring
5/21/2014	Al Mink	Niki Timmons	Meeting	Review process for submitting and following up on past due real real-estate submissions to Wayne County
5/21/2014	Al Mink, Bob Childree, Kevin Barr	Juan Santambrogio and Daniel Jerneycic - Ernst & Young	Meeting	Cash Forecast vs. 10 Year Plan variance
5/21/2014	Bob Childree, Michael Gaul	Executive Director of GRS/PFRS, RS legal counsel, RS actuary, and RS financial advisor	Meeting	POA treatment re: Retirement Systems
5/27/2014	Al Mink	Glenn Kushiner	Call	Conference call to discuss Payroll and Governance
5/28/2014	Al Mink	Joel Kowalski	Meeting	CAFR audit. Review with him the 2012 management letter from KPMG
5/28/2014	Michael Gaul, Kevin Barr	Juan Santambrogio and Nick Bugden - Ernst & Young	Call	Detailed 10 Year-40 Year Working Model Review
5/28/2014	Kevin Barr	Kevin Hand and Glenn Kushiner - Conway Mackenzie	Call	Deferred Reinvestments
5/29/2014	Al Mink	Glenn Kushiner	Call	Conference call to discuss payroll
5/30/2014	Michael Gaul	Jones Day personnel	Call	Bankruptcy discovery transmission issues
5/31/2014	Michael Gaul	Brian Leatherman - Jones Day	Call	Bankruptcy discovery transmission issues
6/2/2014	Al Mink, Bob Childree	Niki Timmons, Leighton Duncan, Glenn Kushiner	Meeting	Discuss Wayne County payments
6/2/2014	Al Mink, Bob Childree	Kyle Herman, Miller BuckfireKarl Sankey (not present), Leighton Duncan, Niki, Jeff Addison- Conway Mackenzie, Peter Baywold-Conway Mackenzie	Meeting	Wayne County Property tax issues, process
6/3/2014	Al Mink, Bob Childree	Ursula Holland, Michael Hall, Glenn Kushiner	Meeting	Payroll systems and procedures
6/3/2014	Al Mink	Devin Patel, Jeffrey Addison from Conway, Geoffrey Stewart, Chris DiPompeo, Jones Day, Sheshian Swamathan, E&Y	Meeting	Discuss Cash Reporting
6/3/2014	Al Mink, Bob Childree	Mike Hall, Ursula Holland , Glenn Kushiner Conway Mackenzie	Meeting	Payroll
6/3/2014	Al Mink, Bob Childree	Jeff Addison, Devin Patel - Conway Mackenzie, Jeff Stewart, Dan Jerneycic - E&Y	Meeting	Cash flows, reconciliations, disbursements, A/P , encumbrances
6/3/2014	Michael Gaul	Representatives of Detroit Land Bank Authority	Call	Required funding for Blight remediation
6/4/2014	Al Mink, Bob Childree	John Hill, John Naglick and Glenn Kushiner	Meeting	Finance Reorganization, CFO position, ERP, Payroll, monthly reporting
6/4/2014	Al Mink, Bob Childree	Lena Willis, Boysie's deputy	Meeting	Encumbrances, A/P
6/4/2014	Michael Gaul	Derrick Puliam - Alpha Lit	Call	Bankruptcy discovery transmission issues
6/5/2014	Al Mink	John Naglick, Glenn Kushiner	Meeting	Continue discussion on finance and accounting issues
6/5/2014	Al Mink	Larry King, Kevin Hand	Meeting	Work being performed on Accounting Organization
6/5/2014	Al Mink, Bob Childree	Larry King and Chris Gannon - Conway Mackenzie	Meeting	Finance reorganization, Job descriptions, Hr
6/5/2014	Al Mink, Bob Childree	John Naglick and Glenn Kushiner	Meeting	Financial reporting.
6/6/2014	Michael Gaul, Kevin Barr	Derrick Puliam - Alpha Lit	Call	Bankruptcy discovery transmission issues
6/10/2014	Bob Childree, Michael Gaul, Brian Gleason	Robert Gordon, Joe Turner, Michael , Ron King	Call	Retirement systems
6/10/2014	Bob Childree, Michael Gaul, Brian Gleason, Kevin Barr	Evan Miller, Alexander Blanchard - Jones Day	Call	Pensions and OPEB
6/10/2014	Michael Gaul	RS legal counsel	Call	Pension governance
6/11/2014	Kevin Barr	Kevin Hand and Emily Petrovski - Conway Mackenzie	Meeting	Fire Dept. Review
6/12/2014	Michael Gaul	Tina Tolliver - DPD	Meeting	DPD RRI's
6/13/2014	Kevin Barr	Nick Bugden and Juan Santambrogio - Ernst & Young	Call	10 Year model
6/13/2014	Michael Gaul	Erica Raleigh - Data Driven Detroit	Meeting	Data gathering re: Detroit

Exhibit 3				
Date	Phoenix Attendees	Attendees	Type of Meeting	Topics
6/17/2014	Kevin Barr	Kevin Hand and Emily Petrovski - Conway Mackenzie	Call	Fire Dept. Review
6/26/2014	Kevin Barr	Daniel Jerneycic and Shavi Sarna - Ernst & Young	Call	Utilities

Exhibit 4

Phoenix Management Services, Inc.
In re: City of Detroit, Michigan, Debtor
Case No. 13-53846
Open Information Requests as of July 18, 2014

REQUESTED PARTY	DATE REQUESTED	DATA REQUESTED	STATUS
<u>OUTSTANDING REQUESTS</u>			
Jones Day	6/10/14	Any stochastic or sensitivity analyses undertaken by City advisors or advisors to the Retirement Systems relevant to use of a 6.75% investment return assumption for GRS.	
Ernst & Young	5/21/14	Comparison of the Revenue and Expenditures as reported on E&Y's Actual Cash Flow reports for the fiscal years 2012 and 2013 against the completed CAFR	
Ernst & Young	5/29/14	Pension: All pension plan sensitivity analyses; including, those that look at how changes in investment returns impact unfunded level	Received for PFRS; not received for GRS
Ernst & Young	5/29/14	Pension: Sensitivities on how different pension return rates impact the pension restoration provisions in the plan	Received for PFRS; not received for GRS
		If none exist, please run Pensions UAAL calculation at 3%, 5%, 6%, and 8% assumed rate of return	
Ernst & Young	5/30/14	Actuary reports/analysis that provide detailed support behind yearly contributions to pensions for active employees in the 40 Year Plan	
Ernst & Young	5/29/14	Modified version of 10 Year Plan that fully integrates CM's Restructuring Initiatives within the departmental budgets – including the department-level detail of Restructuring deferrals	

<u>REQUESTED PARTY</u>	<u>DATE REQUESTED</u>	<u>DATA REQUESTED</u>	<u>STATUS</u>
Ernst & Young	6/6/14	Detail of estimated post-BK professional fees (Jones Day, E&Y, AND CM) in POA forecasts	
Conway MacKenzie	5/22/14	Reconciliation of 10 Year Plan and City's Triennial Budget	
Conway MacKenzie	5/27/14	Status of Fox Lawson review of White Book; anticipated changes to pay grades and classification post-petition; estimated Plan impact of said changes	
Conway MacKenzie	5/27/14	Total budget - by line item - for each department in Finance, Accounting and IT if Centralized Governance was approved. How much City wide the ten year plan envisions spending on IT, Accounting and Finance?	
Conway MacKenzie	6/6/14	Detail of estimated post-BK professional fees (Jones Day, E&Y, AND CM) in POA forecasts	
Ernst & Young/CM	7/9/14	City employee headcount by department- as of 6/30/14; gross payroll cost (excluding OT) for FYE 6/30/14; annualized gross payroll run rate (excl. OT) as of 6/30/14	